Document of
The World Bank

Report No: 26517-PH

GEF PROJECT DOCUMENT

ON A

PROPOSED GLOBAL ENVIRONMENT FACILITY TRUST FUND GRANT

IN THE AMOUNT OF US$12 MILLION

TO THE

REPUBLIC OF THE PHILIPPINES

FOR AN

ELECTRIC COOPERATIVE SYSTEM LOSS REDUCTION PROJECT

March 18, 2004

Energy and Mining Sector Unit
East Asia and Pacific Region

CURRENCY EQUIVALENTS

(Exchange Rate Effective February 18, 2004)

Currency Unit = Philippine Peso (P)
P 1 = US$0.0178
US$1 = P 56.1

FISCAL YEAR
January 1 -- December 31

ABBREVIATIONS AND ACRONYMS

ADB	Asian Development Bank
ALGAS	Asia Least-Cost Greenhouse Gas Abatement Strategy
CAS	Country assistance strategy
CO2	Carbon dioxide
DBP	Development Bank of the Philippines
DOE	Department of Energy
DSM	Demand-side management
EC	Electric cooperative
EPIRA	Electric Power Industry Reform Act
ERC	Energy Regulatory Commission
ESCO	Energy service company
FI	Financial institution
FMR	Financial monitoring report
GEF	Global Environment Facility
GHG	Greenhouse gas
GOP	Government of the Philippines
GWh	Gigawatt-hours (1,000,000,000 watt-hours)
IMC	Investment management contract
LGUGC	LGU Guarantee Corporation
MW	Megawatt (1,000,000 watts)
NEA	National Electrification Administration
NPC	National Power Corporation
NRE	New and renewable energy
PEP	Philippine Energy Plan
PHRD	Japan Policy and Human Resources Development Fund
PIP	Project implementation plan
PSALM	Power Sector Asset and Liability Management Corporation
REFC	Rural Electrification Financing Corporation
REP	Rehabilitation and efficiency plans
SPUG	Small power utilities group
TA	Technical assistance
Toe	Tons of oil equivalent
W	Watt

Vice President:	Jemal-ud-din Kassum
Country Director:	Robert Vance Pulley
Sector Manager:	Junhui Wu
Task Team Leader:	Selina Wai Sheung Shum

PHILIPPINES
ELECTRIC COOPERATIVE SYSTEM LOSS REDUCTION PROJECT

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PHILIPPINES
Electric Cooperative System Loss Reduction Project

GEF Project Document

East Asia and Pacific Region
EASEG

Date: March 18, 2004
Sector Manager: Junhui Wu
Country Director: Robert V. Pulley
Project ID: P066532
Focal Area: C - Climate change

Team Leader: Selina Wai Sheung Shum
Sector(s): Power (100%)
Theme(s): Climate change (P), Infrastructure services for private sector development (S)

Project Financing Data

[ ] Loan [ ] Credit [X] Grant [ ] Guarantee [ ] Other:

For Loans/Credits/Others:
Amount (US$m):

Financing Plan (US$m): Source	Local	Foreign	Total
BORROWER/RECIPIENT	0.22	0.00	0.22
GLOBAL ENVIRONMENT FACILITY	0.00	12.00	12.00
BORROWING COUNTRY'S FIN. INTERMEDIARY/IES	15.75	21.75	37.50
LOCAL SOURCES OF BORROWING COUNTRY	12.58	0.00	12.58
SUB-BORROWER(S)	0.00	0.00	0.00
Total:	28.55	33.75	62.30

Borrower/Recipient: REPUBLIC OF THE PHILIPPINES; LGUGC
Responsible agency: DEPARTMENT OF ENERGY
Address: Energy Center, Merritt Rd., Fort Bonifacio, Taguig, Metro Manila
Contact Person: Ms. Mylene Capongcol, Assistant Director, Electric Power Industry Administration Bureau
Tel: (63-2) 840-1021 Fax: (63-2) 840-2120 Email: mycaps@doe.gov.ph
Other Agency(ies):
LGU Guarantee Corporation (LGUGC)
Address: 28/F Antel 2000 Corporate Center 121 Valero St., Salcedo Village, Makati City
Contact Person: Vicente A. Laza, Senior Vice President
Tel: 750-4166 Fax: 888-4217 Email: vlaza@pacific.net.ph

Estimated Disbursements (Bank FY/US$m):

FY	2004	2005	2006	2007	2008	2009	2010	2011	
Annual	0.00	5.50	0.40	0.40	5.30	0.20	0.10	0.10	
Cumulative	0.00	5.50	5.90	6.30	11.60	11.80	11.90	12.00	

Project implementation period: about seven and a half years
Expected effectiveness date: 07/01/2004 **Expected closing date:** 12/31/2011

A. Project Development Objective

1. Project development objective: (see Annex 1)

The main objective of the Project is to achieve significant and sustained energy efficiency improvements in electric cooperatives (ECs) in order to provide current and prospective viable EC customers with reliable and least-cost power supply over the long term. Towards this end, the project would (i) develop and test financial and contractual mechanisms to support private sector investment, management and operation, and risk sharing to support system loss reduction measures in selected ECs; and (ii) support commercial lending to qualified ECs for efficiency improvements. For (i), the project would pilot the use of investment management contracts (IMCs) to attract private investors to manage and operate selected ECs under long-term, performance-based contracts, and to mobilize private finance without recourse to the government. For those ECs that are yet unable to attract private investors, access to affordable term loans would be facilitated under (ii). Both objectives will be supported by the establishment of the partial credit guarantee program for commercial loans under this Project.

2. Key performance indicators: (see Annex 1)

The monitoring indicators of the Project will be of three categories. The first category will address both the quantity and quality of the credit guarantee program. Performance indicators will include the number and value of loans and credit guarantees, the number of commercial lenders and IMC transactions, the total amount of debt and equity investment mobilized, and the amount of net guarantee claims under the Project. The second category will measure greenhouse gas (GHG) mitigation impacts, including quantified energy savings and reductions in CO_2 emissions. The third category will address the socio-economic impact. Baseline data, including average household income, monthly expenditures on energy consumption and frequency of power supply interruptions, will be collected through household surveys at the outset of project implementation and compared with additional data to be collected during project implementation phase.

3. Global Objective: (see Annex 1)

The global objective of the GEF support will be to reduce GHG emissions through the removal of barriers to energy efficiency investments in the rural power distribution sub-sector. This will be achieved through the pilot use of innovative contractual mechanisms and GEF-funded partial credit guarantee program to promote private investments and financing.

B. Strategic Context

1. Sector-related Country Assistance Strategy (CAS) goal supported by the project: (see Annex 1)

Document number: 24042-PH **Date of latest CAS discussion:** June 4, 2002

This Project is fully consistent with the Bank's Country Assistance Strategy (CAS) for the Philippines, which emphasizes supporting accelerated growth and empowering the poor to participate more fully in development. In supporting these key areas, the CAS identifies priority agenda items for the Bank, which include improving rural infrastructure services, strengthening private sector participation and enhancing environmentally sustainable rural development. This Project will positively contribute to each of these development areas as a part of a comprehensive Rural Power Development Program of reforms and priority investments that are critical for achieving the sector's goals. It will complement targeted Bank/GEF support for the renewable energy aspects of the program under the ongoing Rural Power Project.

1a. Global Operational strategy/Program objective addressed by the project:

The Project is fully consistent with the objectives of the GEF Operational Program No. 5: Removal of Barriers to Energy Efficiency and Energy Conservation (see Section 2) and the GEF Project Brief was approved by the GEF Council for work program inclusion in May 2003. It is also consistent with the Government of the Philippines' (GOP) climate change mitigation strategy. The GOP ratified the UN Framework Convention on Climate Change (UNFCCC) in August 1994, and more recently, the Kyoto Protocol in October 2003. The UNDP/ADB/GEF Asia Least-Cost GHG Abatement Strategy (ALGAS) report and the preliminary outcomes of the UNDP/GEF Capacity Building Activity both highlighted the crucial role of the energy sector in reducing Philippines' GHG emissions and identified power system energy efficiency improvement as a key tool to achieve large-scale GHG emission reductions.

2. Main sector issues and Government strategy:

Barriers to loss reduction investments in ECs. Despite obvious and significant opportunities for energy efficiency improvements in many ECs, most of them have suffered from systemic operational and financial problems and have been unable to turn around their operations. The main barriers have been:

- *limited EC equity and creditworthiness*, which has prevented access to affordable commercial financing to undertake significant efficiency improvements, modernization of equipment and operation, and staff training;
- *limited public sector financing*, due to the precarious finances of National Electrification Administration (NEA) and competing GOP development priorities;
- *political interference in EC investments*, which has often resulted in extension of coverage to low density/remote areas and/or straining of existing networks;
- *weak management in some ECs*, which has resulted in sub-optimal business operations, system maintenance and staffing;
- *poor management systems*, including inadequate use of management and geographic information systems (MIS and GIS), that could improve system operations and planning analyses, billing, collection, and service;
- *Inadequate business incentives* for EC management and staff to achieve efficient operations and improve service quality and reliability; and
- *limited technical expertise within ECs*, on system improvement options, proper maintenance practices, modernization needs, etc.

Rural Power Sector Reform: In response to the challenges faced by the rural power sector, the government has put in place a reform framework to enhance efficiency and increase the electrification of rural areas in a sustainable manner. In particular, a paradigm shift will leverage limited government resources by attracting a diversity of new players and solutions from the private sector to transfer financial resources, technology and management know-how within a competitive and transparent rule-based framework. Given the large financing requirements for rehabilitation and expansion investments, maximization of private investment is intended to be the central principle to change the mindset of the sector which has thus far relied on public sector funding. However, it is recognized that a transitional period would have to be allowed for the gradual buildup of private investment in the sector. Thus, a dual track of public and private funding and public/private partnerships structured to attract private financing is envisaged. In this regard, it is essential that a coherent sector policy and related donor assistance ensure that scarce public sector funding does not compete with potential private sector funding.

Rural Power Project: This Project will be complementary to the ongoing Rural Power Project aimed at

helping the country to make available affordable and reliable electricity services to meet the energy needs of rural communities in a sustainable manner. This would be accomplished under a two-pronged approach of (i) improving the quality and reliability of the grid-connected EC networks; and (ii) increasing the provision for electricity service to other areas using least-cost options, with emphasis on piloting public/private partnership business models for decentralized electrification. Successful implementation of these pilot programs would then be replicated and scaled-up in subsequent phases of the Adaptable Program Loan (APL). The use of a programmatic approach to improve existing rural power supply offers the best prospects of developing and implementing a comprehensive and coherent sector policy, mobilizing the required donor and public assistance to complement potential private sector investment, and phasing development interventions to coincide with reform progress.

Refocused Role of NEA. NEA is the apex organization for rural electrification. In the past, the NEA financed about 90 percent of the ECs' funding requirements. However, mainly due to its less-than-satisfactory performance in lending and inadequate financial discipline, coupled with its undercapitization, NEA has been plagued by serious financial problems. As part of the reform action plan of the rural power sector, NEA is in the process of major reorganization. Specifically, consistent with the provision of Executive Order (E.O.) 138 to rationalize directed credits, NEA will limit lending to marginal ECs that are not able to tap commercial financing by using its surplus cash generated internally (if any), and may provide emergency financial assistance to ECs hit by typhoon or other natural calamities. In addition, the Electric Power Industry Reform Act (EPIRA) mandates the NEA to (a) prepare the ECs for operating in the envisaged competitive market environment; (b) strengthen the ECs technical and financial viability; (c) review and upgrade the regulatory policies related to ECs; (d) develop Performance Improvement Programs, and Rehabilitation and Efficiency Plans; (e) grant EC franchises until the reversion of this mandate to Congress in 2006; (f) administer subsidies from Congressional appropriation for line expansion by ECs; and (g) guarantee ECs in power purchase from the spot market. Apart from the operational improvements, the revised mandate of the NEA includes the temporary takeover of EC management if there is a sustained failure of meeting operational guidelines. As NEA will no longer able to be a significant lender to ECs, the NEA Board has approved the following policies to encourage new lenders and investors for the ECs: (i) a collateral sharing policy with new lenders that is critical for ECs to access commercial funding; and (ii) implementation of IMCs.

Status of ECs. Among rural ECs, there is a great diversity of performance and much more needs to be done, both in terms of efficiency improvements in existing operations and widening access to power supply services, than can be accomplished under the Rural Power Project. Of the 119 ECs in operation throughout the country, only about 25 percent of the ECs, for example, are considered eligible for private sector financing. Among the remaining 75 percent, many incur high levels of distribution system losses, which translate into higher tariffs and high GHG emissions, and a constrained ability to expand their distribution networks. The government's concern over the high system losses is reflected in the passage of the 1994 Electricity Anti-Pilferage Act (RA 7832). The Energy Regulatory Commission (ERC) is responsible for the implementation and enforcement of RA 7832, and thus requires that every electricity distribution utility, including the ECs, submit monthly reports on the automatic cost adjustment formula used to recover system losses in their schedules of rates. However, 61 ECs (51 percent) had losses higher than the regulatory cap of 14 percent of system losses in 2002 under RA 7832.

EC Performance Improvements. In accordance with the EPIRA, E.O. 119 calls for improvements of EC performance, including rehabilitation and restructuring, while providing for condonation of EC loans (from NEA and other government agencies) with corresponding reductions in EC tariffs. In this connection, minimization of political interference and maximization of professional management and commercial operations are the key elements of the remedial action plan to improve EC performance. As elaborated below, one of a number of options to achieve this goal is use of an innovative hybrid concession model,

namely an IMC. When applied to ECs, the IMC arrangement indicates an investment in, and the management of, one or more ECs by a private investor, the specific terms of which are governed by a contract between the EC and the IMC investor.

3. Sector issues to be addressed by the project and strategic choices:

Consistent with the government policy of fiscal prudence, maximization of private investment is the strategy for improving distribution sector performance, which has thus far relied on public sector funding. In light of the significant diversity of performance among the ECs, the basic principle of the strategy is to tap, as a first resort, private sources of funding for EC investments. Public sector debt financing will generally be limited to the financing of: (a) financially viable investments (upgrading, subtransmission projects, etc.) by marginal ECs, that are important to lift those ECs from that status, but are unable to attract private funding, and (b) expansion investments for both on-grid and offgrid electrification by financially viable ECs and new qualified third-party (QTP) players in certain unserved areas in accordance with the provision of EPIRA. The expansion investment project in such a case is generally not commercially viable and requires government subsidy to enable the QTP to obtain an adequate return. For ECs operating in commercially disadvantaged areas, and with limited prospects for creditworthiness, "smart" subsidy, namely, transparent and well-targeted government funding, may be considered to help enhance the affordability of the poor.

Using a screening methodology (see Table 1), those ECs that are able to attract commercial financing (Type A) and those that are inherently commercially unviable (Type D) were first excluded from the scope of this project. Of the remaining candidates, indicators of critical mass (size and density), high tariff margins, high losses, low collections, and the ability for projected cash flows to meet existing debt obligations were then reviewed. Based on this analysis, the remaining ECs were divided into (i) Type B ECs, which are strong candidates for private sector investment and operation through IMCs; and (ii) Type C ECs which are not yet able to attract commercial financing without public support.

Table 1. Categorization of ECs

EC Category	Characteristics	Size	Comments
Type A	Creditworthy, financially self-sufficient	Baseline: about 30 ECs (25% of total ECs)	Increased autonomy, phase out public sector financing *Long-term target: increase to about 90% of total ECs*
Type B	Not fully creditworthy, but larger size and density mean big potential efficiency gains (high losses/low collections)	Baseline: about 10 ECs (8% of total ECs)	Phase out public sector financing using IMC model *Long-term target: convert all to Type A ECs*
Type C	Marginal viability, unable to attract private financing at present	Baseline: about 44 ECs (37% of total ECs)	Public sector lending or credit enhancement *Long-term target: convert all to Type A ECs*
Type D	Operating in low density and disadvantaged areas – unviable	Baseline: about 35 ECs (29% of total ECs)	Smart subsidy from government *Long-term target: decrease to about 10% of total ECs*

Note: Due to changing conditions, the categorization of specific ECs is dynamic in nature.

Type B ECs. Under a PHRD-financed technical assistance (TA) grant, a feasibility study was completed for IMC pilots in five ECs, the management of which has been taken over by NEA due to their poor

management and financial performance. The findings of this study, including consultations with potential private investors/operators, confirm the potential for pilot ECs to attract private risk capital and improve the quality of service by turning over the management of EC operations to the IMC investors/operators over a long-term contract period. As noted above, not all ECs would be attractive enough for private investments, thus the ECs would have to be carefully screened. The NEA Board has approved the implementation framework for IMCs, and promotion of this new approach was cited by the President of the Philippines in her Ten-Point Program to reduce electricity rates through strengthening the ECs. Under the IMC framework, investors will assume full management and profit and loss responsibility for EC operations, accountable to the EC Board. The IMC investor will be responsible for mobilizing financing for capital investment from its own equity, from debt with the IMC investor as borrower, and from surplus cash internally generated by the EC concerned. The IMC would, by design, provide incentives for efficiency through performance-based remuneration, enhance the accountability of service providers and mobilize private finance. The duration of the IMC contract would be sufficiently long (up to 15 years) to provide an incentive for private investment and to initiate and sustain improved operational efficiency and service levels, the EC workforce culture and consumer expectations after the eventual departure of the IMC contractor. GEF PDF B-financed TA work is underway to develop competitive bidding documents for performance-based IMCs in the pilot ECs. An initial IMC pilot program will be implemented in about five of the strongest-performing Type B ECs to test the concept and, if successful, the program will be expanded to include more Type B and some Type C ECs. Under this Project, partial loan guarantees will be made available for IMC investors to facilitate their access to term debt to match EC investments.

Type C ECs. The provision of commercial loans to ECs would mark a significant shift from past financing arrangements. Previously, NEA represented the key financier and procurement agent of EC operations and investments. This public financing and management modality, while resulting in over a decade of EC operation and system expansion, has resulted in NEA's insolvency, substantial accumulated debt to the ECs, poor service levels and high supply costs in many areas. Constrained public resources by NEA also resulted in years of under-investment by ECs in system rehabilitation, maintenance and loss reduction. This public financing approach and allocation of resources among ECs also allowed for political interference in their operations, often times prioritizing coverage expansion to marginally viable areas over much needed system improvements. In addition, review of EC financial indicators and investment plans by NEA did not allow for sufficient rigor and business discipline that would improve prospects for positive cash flows from each investment made by the ECs. By shifting the key financing function from NEA to commercial lenders, and offering ECs increased autonomy, EC investment and operation plans will undergo more critical assessments by bankers while maintaining an arm's length from political influence.

Using selection criteria developed, all the Type C ECs to be supported under this project are those have sufficient internal management and technical capabilities and business/investment plans to improve financial positions of their operations over time. Eligible ECs would have fairly good managers, the desire and commitment to turn around and an inherently viable structure (e.g. required consumer mix and network characteristics for profitable operations). Selected ECs would be potentially viable, but not yet able to attract private risk capital. They would be constrained in financing badly needed investments to enhance their revenues and operational efficiency, but could seek private equity funding after achieving an improved financial position over the medium and longer term. Building on the results of earlier studies on the rural power sector, PHRD-financed TA activity has developed a comprehensive institutional and financial restructuring program to break the vicious circle of under-investment to reduce system losses and improve operational efficiency, thereby transforming selected Type C ECs towards financial self-sufficiency. In this context, well-managed Type C ECs could benefit from affordable term financing for viable energy efficiency investments and system upgrades through GEF-supported credit enhancement facilities under this Project. Such instruments would allow commercial banks to provide extended loan maturities for investments in reducing system losses. The strategy is that some Type C ECs could then be converted to

Type B ECs over time and, eventually to Type A. Meanwhile, Type C ECs could be reviewed for possible clustering under three scenarios: (a) ECs adjacent to Type A ECs could have management and operations merged; (b) ECs adjacent to Type B ECs could be clustered if there was sufficient investor interest; and (c) clustering of contiguous Type C ECs could be done to achieve a critical mass and investor bids for the entire cluster given preference.

Barriers to Commercial Investments: There are several barriers to accessing affordable financing for these efficiency improvements. For the IMC mechanism, these include the following: (i) inadequate investor confidence with the EC's own assessment of its baseline system performance; (ii) EC community skepticism about private sector management and potential benefits; (iii) GOP/EC community uncertainty about the investor's ability to operate and turn around under-performing ECs; (iv) investor uncertainty about entering into long-term contracts with ECs; (v) limited access to affordable financing for investors to undertake large-scale investments in marginally viable ECs; and (vi) high perceived commercial risks associated with taking over EC operations. For Type C ECs, barriers to financing include: (i) perceived high credit risks and corresponding lack of willingness by local commercial banks to provide affordable term financing for efficiency investments; (ii) inadequate management ability to maintain efficiency gains; and (iii) limited technical expertise to develop and implement energy efficiency improvement projects.

Preliminary analyses have shown that attractive returns on equity for IMC investors in ECs are possible and a number of potential investors, including some Type A ECs and other local private distribution utilities, have expressed an interest in the IMC concept. However, potential investors have expressed their preference for lower risk transactions. Until the IMC model can be successfully tested, there is insufficient evidence that the risk-adjusted rate of return would justify private sector investments.

In terms of debt financing to Type C ECs, consultations with selected ECs revealed that collateral requirement by commercial banks is a major barrier to EC borrowing because EC assets have already been pledged to NEA as collateral on their existing loans. In accordance with the provision of the EPIRA, existing NEA loans to ECs will be assumed by the Power Sector Asset and Liability Management Corporation (PSALM), subject to individual ECs meeting a set of guidelines and criteria relating to management and financial performance improvements. As NEA intends to maintain its blanket mortgages on all EC distribution system assets even after PSALM loan assumptions until the loan obligations are fully retired, it is essential that NEA enter into a collateral sharing agreement with the new lenders/guarantors to mobilize new financing for the ECs. NEA Board has adopted a clear policy and related implementation guidelines on collateral sharing with new lenders. As a condition of the effectiveness of the GEF grant, NEA will amend the implementation guidelines for collateral sharing to make explicit reference to the possible role of a guarantor supporting the non-NEA lenders. In addition to collateral sharing, the loan guarantee program under this Project would facilitate qualified ECs to tap financing from commercial financial institutions.

C. Project Description Summary

1. Project components (see Annex 2 for a detailed description and Annex 3 for a detailed cost breakdown):

Component	Indicative Costs (US$M)	% of Total	Bank financing (US$M)	% of Bank financing	GEF financing (US$M)	% of GEF financing
1a. Eligible EC subproject investments	50.00	80.3	0.00	0.0	0.00	0.0
b. Partial Credit Guarantee Facility	10.00	16.1	0.00	0.0	10.00	83.3
2. Capacity Building and Implementation Support	2.30	3.7	0.00	0.0	2.00	16.7
Total Project Costs	62.30	100.0	0.00	0.0	12.00	100.0
Total Financing Required	62.30	100.0	0.00	0.0	12.00	100.0

The project would consist of two components: (1) Partial Credit Guarantee Program: including (a) eligible EC subproject investments; and (b) establishment of a GEF-funded partial credit guarantee facility to support such investments; and (2) capacity building and implementation support for key stakeholders.

(a) Partial Credit Guarantee Program: In light of the potential high risk exposure of potential investors under the IMC model and the marginal creditworthiness of many Type C ECs, a partial credit guarantee program for commercial loans will be established under this Project. The government has selected LGU Guarantee Corporation (LGUGC) to be the Guarantee Program Manager to manage and operate two windows, one for loans to Non-ECs (i.e. the pilot IMCs) and the other for loans to qualified ECs. Underlying principles of the facility would include: (i) the guarantee would provide risk mitigation to lenders, and therefore to investor borrowers, to support energy efficiency investments; (ii) guarantees would leverage on existing banking credit assessments expertise, share borrower credit risk with commercial lenders and improve terms and access to loan financing including the extension of maturities for borrowers; (iii) the guarantee coverage required would be determined by the nature of each investor/EC and relative status of the EC, as well as specific debt financing structure; and (iv) the guarantee liabilities for a given transaction would be decreased over the life of the loan in line with principal amortization schedule.

The Project is designed to provide credit guarantee in concert with specific debt financing structures, given that the project targets a limited number of investments in a specific sector, i.e., ECs, which will have similar credit and financial structure characteristics. The partial credit guarantee program would allow for flexible guarantee coverage (up to 80 percent) depending on perceived borrower credit risk for each loan transaction and charge borrowers (through lenders) appropriately priced guarantee and processing fees. Revenues accrued from guarantee fees will be used to cover administration costs and serve as part of guarantee loss reserve, allowing for preservation of the GEF capital. Processing fees will be retained by LGUGC as performance-based compensation for its management services.

GEF guarantee exposure as well as the underlying loan term and amortization schedule will be accounted and monitored. The guarantee program will define (i) an "availability period", during which new guarantees can be issued, about 7 years, and (ii) a maximum term for guarantees, e.g., 10 years, to be determined based on overall EC project finance requirements. (IMC contracts may be for 15 years, but the loan term for financing system improvements will likely be shorter, reflecting the economics of the projects and ability and willingness of lenders to extend term finance.) Prior to grant effectivenss, LGUGC, in consultation with prospective lenders, will prepare and adopt the Operations Manual, satisfactory to the Bank, setting forth the specific policies and procedures for the implementation of the partial credit guarantee program, including inter alia, terms and conditions for credit guarantees, the criteria for credit guarantee eligibility, project performance indicators and reporting requirements.

(b) Capacity Building and Implementation Support: Activities under this component will include two subcomponents, implemented by LGUGC and DOE, respectively, as follows:

I. LGUGC subcomponent: (i) Provision of technical assistance, training, study tours and workshops to LGUGC, financial intermediaries, selected electric cooperatives, and electric cooperatives investors (including investment management contractors), in transactions involving electric cooperatives, including screening of electric cooperatives, development of an economic power distribution system upgrades sub-project pipeline, and carrying out of feasibility studies and appraisal of economic power distribution system upgrades sub-project applications.(ii) Provision of technical assistance to LGUGC for the carrying out of workshops, market promotion, and information dissemination to electric cooperatives, financial intermediaries and investors on the investment management contract mechanism, the electric cooperatives improvement program and the credit guarantee program. (iii) Strengthening the capacity of LGUGC in Project implementation, including the provision of technical assistance, training, study tours, workshops and office equipment.

II. DOE subcomponent: (i) Provision of technical assistance to DOE for the carrying out of periodic reporting, monitoring and evaluation of the credit guarantee program, including the performance of investment management contractors and the service level performance of electric cooperatives, and the carrying out of an assessment of the energy efficiency gains of electric cooperatives from improved access to commercial lending. (ii) Strengthening the capacity of DOE and the NEA in Project implementation, including the provision of technical assistance, training, study tours, workshops and office equipment. (iii) Provision of technical assistance, training and workshops to DOE and the NEA on investment management contract transactions, including the development of bidding documents and contract management. (iv)Provision of technical assistance, training, study tours and workshops to the Energy Regulatory Commission in the preparation of regulations for electric cooperatives and investment management contracts. (v) Provision of technical assistance, training, study tours and workshops to electric cooperatives in technical, operational and management aspects, including good governance.

2. Key policy and institutional reforms supported by the project:

Policy and institutional reforms are being sought under the associated Rural Power APL, which would allow this operation to fully realize its objectives. These reforms are consistent with the thrust of EPIRA, an indicative action plan for policy and institutional reform over the medium- and long-term. This reform framework covers the following priority areas: (a) rationalization of tariff and subsidy policies for both grid and off-grid electrification, which would be covered in part by the implementing rules and regulations of the EPIRA; (b) rationalization of franchise areas and opening up unelectrified areas to qualified third parties; (c) segmented financing strategy for ECs, measures for performance improvements of ECs to enable them to operate and compete effectively under a deregulated market and transformation of marginal ECs towards financial self-sufficiency over the longer-term; (d) comprehensive institutional and financial restructuring of NEA; and (e) privatization of SPUG, which is critically dependent on the rationalization of tariff and subsidy policies as noted above.

The Project will be implemented in the context of the Philippines power sector restructuring. ECs have a substantial backlog of investment need in power distribution system upgrades and lack access to debt financing. The primary and, in most cases, sole lender to ECs has been NEA. As part of the power sector restructuring underway in the Philippines, as defined in the EPIRA and further supported by the Bank, NEA will no longer be lending to ECs; its primary mandate now is to assist the ECs in their restructuring, management improvement and reinvestment programs. The partial credit guarantee program of the project will support the shifting of EC financing from the defunct NEA to private investors/commercial lenders.

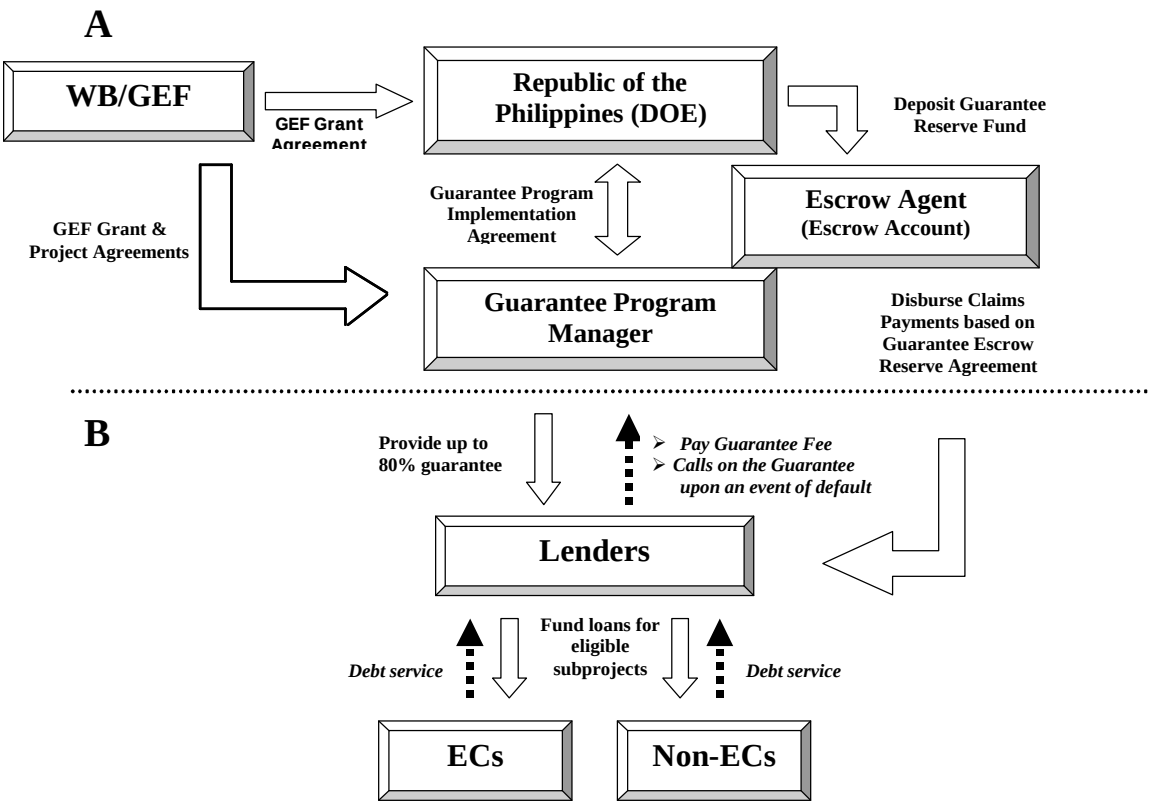
3. Benefits and target population:

Without implementation of the IMC model or loan guarantees for ECs, these companies are expected to remain financially constrained, with limited access to funding for investment upgrades or refinance debt. Under the baseline scenario, these systems will likely continue to deteriorate and outages, system losses and payment arrears will continue and even increase over time. If the IMC model can be developed and tested and commercial lending to qualifying ECs established, the benefits could be substantial. Money losing ECs could be potentially turned around and realize significant improvements in system efficiency levels. In addition, service in remote areas could be improved and system extension could be made in viable areas, providing a significant catalyst for further economic development in these communities. Improved power quality and reliability would also improve prospects for future end-use energy efficiency programs, since high-efficiency equipment often requires high quality and reliable power to function optimally. And, the rehabilitation of ECs would pave the way for more commercial and competitive services in rural areas through out the country. By design, the IMC will include strict performance requirements and service levels for the investor as part of their remuneration package. Key EC service levels will be closely monitored throughout this project under the TA component.

4. Institutional and implementation arrangements:

a. **Implementation period.** 2004-2011.

b. **Implementation Arrangements**:



Executing agencies. The executing agencies would be DOE and LGU Guarantee Corporation (LGUGC).

Project Management: The Project Management Offices (PMOs) of LGUGC and DOE will take charge of

the day-to-day operations of their respective activities.

(a) DOF/DOE has selected ***LGUGC as the Guarantee Program Manager*** for this Project, based on its technical and financial qualifications and the proposal submitted by LGUGC, and will negotiate with LGUGC a Guarantee Program Implementation Agreement to operate the guarantee program. LGUGC is owned 51% by the Bankers Association and 49% by the Development Bank of the Philippines (DBP). LGUGC will assume primary responsibility as the Guarantee Program Manager for EC loan guarantee transactions, and administer the portion of GEF funds for capacity-building in LGUGC, lenders and ECs involved with the guarantee transactions. The Guarantee Program Manager will work with local financial institutions to structure acceptable term financing for the system upgrades and loss reduction investments in EC networks. LGCGC has established a PMO for this Project, with functions and staffing arrangements satisfactory to the Bank. Performance-based compensation for LGUGC will be through its retention of the front-end processing fees charged for the loan guarantee transactions under the project. The balance of the revenues generated from the guarantee program, including guarantee fees, will be accrued to a Guarantee Revenue Account, in the name of the DOE, and the funds from this account will be used to cover operating costs of the guarantee program under the project.

(b) The ***DOE-PMO*** will administer the portion of GEF funds for capacity-building in DOE, NEA, ERC and other public entities, as well as for strengthening the technical and institutional aspects of ECs. The PMO, established by DOE for the Rural Power Project, would be augmented by the recently created IMC Team to cover this Project as well. As in the case of the Rural Power Project, DOE plans to avail of the assistance of the UNDP-DSSC as an administrative agency to assist DOE-PMO in project management, procurement, financial management and disbursement for this Project.

(c) ***Escrow Agent***. The GEF funds for the purpose of the partial credit guarnatee program will be disbursed by the Bank to an escrow account (the Guarantee Reserve Account) in a commercial bank, which will be opened and maintained in the name of DOE, and managed by the trust department of the same bank (Escrow Agent). The initial capitalization of the Guarantee Reserve Account will be $5 million. A second tranche of $5 million would be disbursed upon execution of loan guarantees of at least $4 million. Eventually, a total of $10 million of the GEF Grant proceeds will flow into the Guarantee Reserve Account during project implementation. Interest Income from the Guarantee Reserve Account will accrue to a separate Interest Income Account of DOE. A Guarantee Reserve Escrow Agreement will be entered into between DOE, LGUGC and the Escrow Agent, in a manner satisfactory to the Bank. This Agreement, which will cover the Guarantee Reserve Account, Interest Income Account and Guarantee Revenue Account, will include provisions to the effect that the Escrow Agent will provide the necessary fiduciary services to manage receipt, investment and disbursement of the funds in these accounts.

(d) ***Overall Project Oversight and Coordination.*** An inter-agency Project Supervisory Committee (PSC), to be co-chaired by DOE and DOF, and with participation of LGUGC and the Escrow Agent, will be organized to provide overall policy direction, guidance and oversight supervision for the policy and institutional reforms supported under the program. At the implementation level, a Technical Working Group (TWG) will be organized to serve as a secretariat to the PSC and be responsible for the overall coordination and supervision of the implementation of the Project.

D. Project Rationale

1. Project alternatives considered and reasons for rejection:

A number of other modalities were considered to address existing deficiencies in targeted EC operations

and barriers to energy efficiency investments and improvements. These included:

- NEA support for investment financing and procurement: An obvious option would be to provide substantial public financing to ECs to facilitate investments in energy efficiency gains, along with management and staff training, business development support, and good practice information about high-performing ECs. However, the business-as-usual approach is precisely what the GOP wishes to shift away from and the performance of earlier projects using this approach has been unsatisfactory.
- Fully privatize ECs: ECs are currently considered to be private cooperatives, owned by the consumers in their service territories. Thus, the full sales of EC assets and operation to a private company is at present neither a politically feasible nor socially desirable option at this stage. Furthermore, the EPIRA requires that any transfer of ownership of ECs (within 5 years of loan condonation) will result in the call for all past EC debt repayment to PSALM. However, as sectoral reforms progress and ECs can improve their viability, this could represent a longer-term goal.
- Standard Energy Service Company (ESCO) Contracts: Standard ESCO contracts, where a private firm could design, finance and implement energy efficiency projects within an EC system under a performance contract and payments would be made from energy savings, represent another option for the IMC pilot ECs. However, since many of the problems of ECs targeted for IMCs have operational and managerial problems that extend beyond technical losses, such a model would alone be insufficient to address the range of deficiencies and sustainable removal of barriers as noted above.

2. Major related projects financed by the Bank and/or other development agencies (completed, ongoing and planned).

Sector Issue	Project	Latest Supervision (PSR) Ratings (Bank-financed projects only)	
		Implementation Progress (IP)	Development Objective (DO)
Bank-financed			
Rural power	IBRD/GEF Philippines Rural Power Project	S	S
Energy efficiency loan guarantees	GEF China Second Energy Conservation Project	S	S
Rural electric cooperative management and equitization	IDA/GEF Vietnam System Efficiency Improvement, Equitization and Renewables (SEIER) Project	S	S
EE loan guarantees	IBRD/GEF Croatia Energy Efficiency Project		
Other development agencies			
Rural electrification (financing of REFC)	Possible ADB private sector facility and IFC financing		
EE loan guarantees	IFC/GEF Hungary Energy Efficiency Co-financing Program		

IP/DO Ratings: HS (Highly Satisfactory), S (Satisfactory), U (Unsatisfactory), HU (Highly Unsatisfactory)

3. Lessons learned and reflected in the project design:

In many ways, this Project breaks new ground in areas of management contracts for rural electric cooperatives. The IMC model was identified specifically for the rural EC context in the Philippines and has not been tested elsewhere. Still, the Bank team has considered other rural electrification experiences and lessons from elsewhere.

- The Bank is currently conducting a review of best practices in rural electrification. Some emerging lessons from this review and incorporated in designing the proposed program include: aligning incentives to award good performance of utilities and their management; allowing for cost recovery through appropriate tariff structures and appropriate risk-adjusted returns; reducing operating costs through appropriately designed networks; prudent public/private sector partnerships and business models; the necessity for programs to keep political pressures from interfering with expansion plans and operations; the importance of involving local participation and cooperation to promote local ownership of the project; and the necessity of effective institutional structures to implement programs.
- Consistent with the OED audit report of the previous Rural Electrification Revitalization Project, the selected local Guarantor is financially sound and has a proven track record in loan guarantees in the country. In addition, NEA would not be the financing or procurement agent, due to its poor performance under earlier projects.
- For GEF partial loan guarantee programs, reviews of Bank/IFC/GEF programs in Hungary, Coratia and China highlight the need for clear and transparent appraisal methods for all subprojects, broad risk sharing among end-users, contractors/ESCOs, lenders and guarantors to guard against moral hazard, benefits to work with existing financial institutions (FI) for the Guarantor and participating financial institutions, cost-recovery considerations early in project design, and a clear understanding of target market and credit considerations. The IFC/GEF Hungary Energy Efficiency Co-financing Program, the only GEF-supported partial credit guarantee facility in operation for several years, has shown that partial credit facilities can improve a borrower's access to credit without either requiring lenders to take on unreasonable risks or creating moral hazard, FIs can and do make sound credit decisions if given the proper incentives to do so, TA support can be most effective if focused on pipeline building and transactions rather than large-scale training and workshops, targeted program marketing is critical to pipeline development, the willingness to pay market-rate guarantee fees for new lines of lending business must be carefully assessed and for new lines of business and co-financing the guarantee reserves can greatly help ensure eventual program sustainability.

4. Indications of borrower and recipient commitment and ownership:

The GOP has also supported a national energy efficiency and conservation policy. DOE's Philippine Energy Plan (PEP) (2004-2013) calls for intensified implementation of energy efficiency programs covering the entire spectrum of energy users and projects, with aggregate savings estimated at about 82.6 million barrels of fuel oil equivalent and 3,289 MW of deferred electricity generation capacity over the 10-year period. Other government initiatives include: (i) the ENERCON Program, which promotes the efficient use of power and fuels in public buildings and agencies and mandates consumption reduction targets of 10 percent; (ii) regulation requires all power utilities to submit demand-side management (DSM) plans annually for review and approval; and (iii) regulation (RA 7832) requires utilities and ECs to achieve annual targets of reduced system losses.

5. Value added of Bank and Global support in this project:

Targeted Bank/GEF interventions under this Project, which are highly selective, fit well with both the East

Asia regional strategy and the country's strategy over the 2010 horizon directed at sustainable social and economic development with equity. Over the past few years, the Bank has been instrumental in nurturing country ownership in policy and institutional reforms, most notably in the implementation of a paradigm shift and a segmented EC financing strategy to maximize private sector participation in the rural power sector. The current precarious position of NEA and many of the ECs, thus, present an opportunity to address a major challenge of the GOP and the rural power sector that, until now, has been unresolved.

In light of the Bank's leading work in the rural power sector and support for the ongoing Rural Power Project, the Bank is uniquely positioned to provide the level of comprehensive support to issues relating to improving service within the existing ECs, extending coverage of the ECs to viable areas and supporting further expansion through off-grid and other systems, based on least-cost planning. As part of the Rural Power Project preparation, a sector strategy was developed by the government and provided the underpinning for Bank assistance in the sector. The government's commitment to policy and institutional reforms has been articulated in its Letter of Sector Development Program (LSDP). As the activities supported under this Project are an integral part of the sector strategy and program of actions already covered by the LSDP, this project would be used as a vehicle to support actual implementation of selected priority actions, while achieving the global environmental objectives of GEF at the same time. Furthermore, there is potential for cross-benefits from this more comprehensive approach, in terms of work with potential EC lenders, the promotion of private sector participation, sharing of transaction advisors and other consultants, emerging lessons from rural electrification improvements, Bank supervision, donor coordination, etc.

E. Summary Project Analysis (Detailed assessments are in the project file, see Annex 8)

1. Economic (see Annex 4):

○ Cost benefit NPV=US$ million; ERR = % (see Annex 4)
○ Cost effectiveness
● Incremental Cost
○ Other (specify)

The incremental cost analysis of the Project, along with the global environmental benefits, are presented in Annex 4.

The incremental cost associated with the contingent grant for the capital reserve is equal to the difference between the future value of the gross grant and the money that is returned at the end of the Project. Since the final grant amount will not be known until project closure, the exact amount f incremental cost also will not be known until the grant closing date. The net grant amount would be the portion of the GEF grant that is no longer available at the close of the Project. Financial projections of the partial credit guarantee program conservatively estimates that about 10 percent of the total guarantee liabilities of $30 million may result in a default, triggering payments from the GEF guarantee reserve fund. This represents total losses of $3 million in the guarantee reserve funds. In addition, $2 million would be disbursed as a non-contingent grant for TA activities. Thus, the expected net or final grant would be $5 million and the estimated incremental cost would be about $5.3 million by the end of project implementation.

Leveraging of GEF Funds. Through the guarantee program under the Project, GEF funds could be used to support more than US$50 million of investments, representing a ratio of 10:1 (expected investments to net grant) over the project period. However, given that a second generation of investments is likely to be made from improved finances of the participating ECs after these investments, along with increased commercial lending without requiring the guarantee facility, total leverage of GEF funds could be significantly higher.

2. Financial (see Annex 4 and Annex 5):

NPV=US$ million; FRR = % (see Annex 4)

The partial credit guarantee program will be implemented by LGUGC as the Guarantee Program Manager, based on a Guarantee Program Implementation Agreement between the Government and the Guarantee Program Manager, and LGUGC's Operations Manual, satisfactory to the Bank. Financial projections of the guarantee operation are summarized in Annex 5. By design, the project would only seek to support those investments that are financially viable, creditworthy IMC/non-EC investors and viable ECs (both in terms of financial positions and management).

Fiscal Impact:

Government budget appropriation is not required to provide local counterpart funding for the investment supported under this project. Indeed, the paradigm shift from predominant government funding to maximizing private investment in rural electrification will free up the limited government resources for priority social expenditures. While DOE would need to request for budget appropriation to cover taxes related to its capacity building component, the fiscal impact is neutral as the tax revenues of the government would be increased correspondingly.

3. Technical:

There are no significant technical issues associated with this Project. As a safeguard for the IMC pilots, each potential investor will be pre-qualified to ensure that, among other things, they have sufficient technical abilities to operate the given EC. IMC/non-EC investors and Type C ECs will prepare investment proposals to apply loans from commercial financial institutions (FIs), who will appraise these loan applications based on their financial and technical merits. The Project will include TA both to assist the FI technical assessments as well as for Type C ECs to prepare quality loan applications and investment plans.

4. Institutional:

4.1 Executing agencies:

LGUGC has been selected to serve as the Guarantee Program Manager, based on an assessment of its technical and financial qualifications. LGUGC will assume primary responsibility as the Guarantee Program Manager for EC loan guarantee transactions, and administer the portion of GEF funds for capacity-building in LGUGC, lenders and ECs involved with the guarantee transactions. DOE will administer the portion of GEF funds for capacity-building in DOE, NEA, ERC and other public entities, as well as for strengthening the technical and institutional aspects of ECs.

4.2 Project management:

Project management arrangements, including the organization and staffing of the PMOs at LGUGC and DOE, along with the agreed technical assistance and training program, are considered satisfactory.

4.3 Procurement issues:

No procurement will be required under the partial credit guarantee program, which account for 83 percent of the GEF grant funds. The TA activities will mostly include a number of small consulting assignments, to support the activities previously mentioned. All procurement of consultants will follow current Bank guidelines and be done by DOE and LGUGC.

4.4 Financial management issues:

Disbursements for the guarantee program would be made in two tranches, with the first one provided as an

advance to the Guarantee Program Manager to allow it to book initial subproject pipeline. Waiver of the Bank's disbursement policy was approved for the above up-front disbursement of funds into the Gurantee Reserve Account. The financial management (FM) system of LGUGC as an entity and the FM arrangement for the project are acceptable and satisfy the Bank's minimum FM requirements. Prior to grant effectiveness, the financial accounting manual and chart of accounts of LGUGC would be revised to incorporate the project requirements and procedures, satisfactory to the Bank. In addition, LGUGC shall prepare and furnish to the Bank a financial management staffing plan for the project, satisfactory to the Bank, by June 30, 2005, and carry out such plan by September 30, 2005.

5. Environmental: Environmental Category: F (Financial Intermediary Assessment)

5.1 Summarize the steps undertaken for environmental assessment and EMP preparation (including consultation and disclosure) and the significant issues and their treatment emerging from this analysis.

As in the case of the Rural Power Project, this Project is rated a Category FI project, and the same environmental and social safeguard framework (as adopted by the DOE under the Rural Power Project) has also be adopted by the DOE and LGUGC for this project. Specifically, an Operational Manual will be prepared by LGUGC for this project to include environmental screening procedures for each subproject. This Initial Environmental Examination (IEE) will be prepared for each subproject by the EC prior to approval for any credit guarantee. The IEE may be developed into a full-blown Environmental Impact Statement (EIS) should the IEE generate insufficient information to make a decision on the issuance of the environmental clearance arise. The IEE identifies the potential environmental impacts of each subproject and contains an Environmental Management Plan (EMP). However, no significant adverse environmental and social impacts are expected under the project. Indeed, the project will result in major positive environmental benefits, in terms of improved EC system efficiency, and these benefits (e.g., energy savings, reduced air pollution, reduced GHG emissions) will be measured and quantified during the project.

5.2 What are the main features of the EMP and are they adequate?

An EMP would have two parts, namely 1) the Environmental Mitigation Plan and 2) the Environmental Monitoring Plan. The EMP of individual subprojects will be developed with the participation of key stakeholders and arrangements would be made for public dissemination of the EMP in the participating local communities. Specialists of the subproject sponsors will be responsible for the implementation of the EMP.

5.3 For Category A and B projects, timeline and status of EA:
Date of receipt of final draft:

5.4 How have stakeholders been consulted at the stage of (a) environmental screening and (b) draft EA report on the environmental impacts and proposed environment management plan? Describe mechanisms of consultation that were used and which groups were consulted?

As in the case of the Rural Power Project, stakeholder consultations (community meetings, joint EA scoping and public hearings with the Department of Environment and Natural Resources (DENR), Local Government Units (LGUs) and communities), including but not limited to the EMP, will be carried out during subproject preparation, design and implementation. Stakeholders will be consulted about the subproject site during preparation of the Terms of Reference of the IEEs which include environmental screening of the subprojects and during the processing of their application for Environmental Compliance Certificates with DENR.

5.5 What mechanisms have been established to monitor and evaluate the impact of the project on the environment? Do the indicators reflect the objectives and results of the EMP?

As in the case of the Rural Power Project, an EMP would provide a framework for a comprehensive

monitoring and evaluation of the potential environmental impacts of the project through the entire project cycle. The EMP implementation would be adequately budgeted and monitored by the participating ECs which would be required to report regularly to LGUGC which would, in turn, report to the Bank for evaluation and appropriate action.

6. Social:

6.1 Summarize key social issues relevant to the project objectives, and specify the project's social development outcomes.

The key social impacts of the project are expected to include: (i) improved reliability of energy services; (ii) employment impacts related to EC management and operational changes; and (iii) potential land acquisition for selected subprojects. Each of these are elaborated below:

Rural energy services. Given the current state of many of the ECs, many rural electricity customers experience marginal service, often with low quality power supply as indicated by frequent outages. This project would help improve the reliability of power supply at participating ECs, as indicated by the reduction in power supply interruptions, while containing the rise of operating costs through enhanced efficiency. Baseline data, including average household income, monthly expenditures on energy consumption and frequency of power supply interruptions, will be collected through household surveys at the outset of project implementation and compared with additional data to be collected during project implementation phase.

EC restructuring. The restructuring of selected ECs due to the IMC requirements or changes proposed by EC Boards in order to access commercial financing and improve operational and management efficiencies may result in the redundancy of staff. The capacity building activities under this Project include EC management and institutional strengthening, with particular attention paid to the social impact of any retrenchment program and concrete recommendations will be developed through close consultations with EC staff/management to develop appropriate mitigation measures, including staff training/re-tooling and early retirement packages.

Safeguard Policy Framework. This project will be implemented, in part, through LGUGC , who would select and issue partial credit guarantees on a demand-driven approach. As the subprojects are not yet identified, it remains to be determined whether the project activities would require any land acquisition and resettlement. In line with Bank policy, the project has followed a two-step approach, i.e. policy frameworks during project preparation and action plans if necessary when the specific activities are selected during project implementation. Under the Rural Power Project, DOE and DBP have adopted Policy Framework: Land Acquisition, Resettlement and Rehabilitation of Displaced Persons, and Project Policy Framework on Indigenous Peoples. These policy frameworks, which have also been adopted by the DOE and LGUGC for this project, cover objectives, guarding principles, entitlement policies, organizations, implementation procedures, supervision and monitoring, costing and budgeting requirements, and operational procedures. These policy frameworks have also been discussed and disseminated among key stakeholders.

6.2 Participatory Approach: How are key stakeholders participating in the project?

The Rural Power Sector Policy Note, prepared by the Bank as part of its sector work, was discussed with the government in October 1999. Subsequently, supported by the Bank's pilot fund to promote participatory activities in the Philippines, a series of broad-based consultations with key stakeholders (NGOs and civil society, government and related agencies, key donors) took place in January 2000. The design of the project took into account the comments by stakeholders. Development of the concept for this project was based on the PHRD-financed feasibility studies on the use of IMC contracts for ECs and on transformation of selected ECs. During this work, extensive consultation was done with government

agencies, the ECs themselves, EC Boards and their community representatives and potential investors and lenders. At present, there is strong interest to test the IMC approach which, if successful, could offer substantial benefits for all stakeholders. Processes and procedures for community involvement and consultation will be included in the development of IMC contractual provisions, taking into account the comments by stakeholders.

6.3 How does the project involve consultations or collaboration with NGOs or other civil society organizations?

As noted above, consultations with the civil society were first initiated in January 2000, prior to identification of the project. Summaries of the consultations with civil society and proceedings on the participatory project design planning workshop are available in the project files. The Project Information Document (PID) was disseminated to civil society through the Infoshop and the public information center at the World Bank Manila office.

6.4 What institutional arrangements have been provided to ensure the project achieves its social development outcomes?

The government has a track record of broad-based consultations, including recent consultations with the civil society in connection with the Power Reform Act, which provides for consumer education and protection. In addition, DOE is developing a strategic communications plan with the assistance of PPIAF-financed local consultants, taking into account the results of consumer opinion survey. Under this framework, increased commercial and private participation is expected to substantially decrease the burden of public financing for rural distribution while improving the level and quality of service at lower costs. Through the requirements of IMC and guarantee agreements between LGUGC and the beneficiaries of the credit guarantee program , such outcomes will be explicit and indicators monitored throughout the project period.

6.5 How will the project monitor performance in terms of social development outcomes?

As noted above, socio-economic data, including average household income and monthly expenditures on energy consumption, will be collected through household surveys. The data collected at the outset of project implementation will be compared with those at mid-term reviews and project implementation completion.

7. Safeguard Policies:

7.1 Are any of the following safeguard policies triggered by the project?

Policy	Triggered
Environmental Assessment (OP 4.01, BP 4.01, GP 4.01)	● Yes ○ No
Natural Habitats (OP 4.04, BP 4.04, GP 4.04)	○ Yes ● No
Forestry (OP 4.36, GP 4.36)	○ Yes ● No
Pest Management (OP 4.09)	○ Yes ● No
Cultural Property (OPN 11.03)	○ Yes ● No
Indigenous Peoples (OD 4.20)	● Yes ○ No
Involuntary Resettlement (OP/BP 4.12)	● Yes ○ No
Safety of Dams (OP 4.37, BP 4.37)	○ Yes ● No
Projects in International Waters (OP 7.50, BP 7.50, GP 7.50)	○ Yes ● No
Projects in Disputed Areas (OP 7.60, BP 7.60, GP 7.60)*	○ Yes ● No

7.2 Describe provisions made by the project to ensure compliance with applicable safeguard policies.

Agreement with DOE and LGUGC regarding implementation of the aforementioned Environmental Policy

Framework: Land Acquisition, Resettlement and Rehabilitation of Displaced Persons, and Project Policy Framework on Indigenous Peoples adopted for this project will ensure compliance with the relevant safeguard polices.

F. Sustainability and Risks

1. Sustainability:

Under the IMC model, the prospects for sustainability of energy efficiency improvements under the contract term would be high, since the financial benefits to the investor would be clear and the performance requirements will be stated in the contract. If the model proves viable and benefits to the EC communities can be confirmed, it is expected that the EC Boards would be encouraged by their constituents to promote similar management and operational structures in the future. Furthermore, management and employee incentives are expected to be introduced and maintained in order to promote good business practices. Sustainability of efficient operations after the investor transfers the operation back to the community, though, is a potential risk as noted above. Under the management contracts, measures would be sought to mitigate this risk, such as: (i) requirements under the IMC contracts to provide staff and management training along with performance incentives; (ii) documentation of efficiency gains, improved service levels, tariff reductions (under TA component) to demonstrate benefits to communities; and (iii) other TA efforts, such as management and EC Board training, standard future performance contracts for EC management, etc. In addition, the duration of the IMC contract would be sufficiently long (up to about 15 years) to initiate and sustain the change management towards operational efficiency and improved service levels as well as the culture of EC workforce and expectations of consumers even after the eventual departure of the IMC contractor. And, the Bank's long-term presence in the rural power sector through its APL instrument would allow for continued assistance interventions to address sustainability issues.

For the Type C ECs, sustainability of efficiency gains would require that eligible ECs have sufficient management and technical capability to implement and retain efficiency gains achieved during the project (see Type C EC eligibility criteria in Annex 3). Commercial loan applications submitted under the project would be assessed by a local bank in terms of their commercial viability, sustainability, projected debt service, etc. which would impose an extra level of discipline on the ECs. This would also be supported by the development of project screening criteria for the guarantee program (see Annex 3) as well as some complementary TA efforts to further enhance their capabilities.

In the event the cumulative amount of the guarantee payment reaches $1.5 million under the Partial Credit Guarantee Program, LGUGC will have to develop and implement a remedial action plan, satisfactory to the DOE and the Bank, with the aim to reduce the guarantee claims in the future. In the event the cumulative guarantee claims reach $3 million, this will trigger suspension of new loan guarantee by LGUGC, and DOE will develop and implement a remedial action plan, satisfactory to the Bank, as a pre-condition for the resumption of new loan guarantee commitment.

1a. Replicability:

As noted previously, the IMC concept could have substantial replication potential in the Philippines. If the pilot is successful, the model can be applied to all Type B ECs and some clustering of Type C ECs. The Type C EC guarantee window and other parallel activities under the Rural Power APL will also be undertaken to improve operations in the less viable ECs, which is expected to lead to even more IMC candidates. Over the medium-term, some 20-30 ECs throughout the Philippines could potentially benefit from the IMC model. Also, given the prevailing operational conditions with rural ECs in other countries, the IMC model would offer a significant and innovative option for private sector participation in a difficult and socially sensitive sub-sector. Future potential program sustainability and replication can come from

the following possibilities which will be promoted in program design and operation:

- Guarantee Program Manager expands the EC lending guarantee program with its balance sheet, and further increases the leverage ratio (maximum guarantee liabilities to guarantee reserve funds).
- Lenders come to understand and accept EC credit risks and lend without guarantees - the program will seek to recruit and engage new commercial lenders in the EC term loan market.
- The EC reform program succeeds and the pathway to EC sustainability is demonstrated.
- The IMC model works, more commercial (IMC) investors are mobilized, more ECs take this path, and IMC investors fund their investments without any guarantees on their debt.

The guarantee program is premised on the concept that there is a gap between perceived risks of lending to ECs - under current banking practices and given lack of experience in EC term lending - and real risks. Additionally, investments in system upgrades, which have not always received a priority, could be demonstrated to have lower risk profiles, since they generate distinct revenue streams and could directly improve EC profitability. The current state of affairs is a vicious cycle: EC financial performance is hindered by inefficient distribution systems and EC's can not access financing to upgrade their systems because of poor financial performance. The program will mobilize new financing to start to meet the tremendous backlog of needed investments in EC distribution system upgrades and can start a virtuous cycle of improving financial performance. The program will bring to bear improved management for the ECs - at both corporate and project levels - and can thereby can reduce EC financial performance risks. Projects will be selected that will more than pay for themselves from financial returns, both in reduced power purchase (energy savings) and maintenance costs and increased revenues.

2. Critical Risks (reflecting the failure of critical assumptions found in the fourth column of Annex 1):

Risk	Risk Rating	Risk Mitigation Measure
From Outputs to Objective		
IMC investor ability to turn-around EC operations	M	Contractual provisions and incentives to improve operations, efficiencies, collection, etc.
ECs ability to turn-around operations with loan guarantees	S	Careful development of financial and management eligibility criteria for ECs and parallel TA activities.
No future political interference in EC operations	S	Commitment of the government and policy directive issued to reform the ECs; by shifting the key financing function from NEA to commercial lenders, and offering ECs increased autonomy, EC investment and operation plans will undergo more critical assessments by bankers while maintaining an arm's length from political influence; TA for strengthening EC management, including good governance
Stable energy demand in EC territories	N	
ECs can maintain efficiency improvements beyond IMC contracts and project period	M	Contractual provisions requiring staff/management training and complementary TA activities.
Ability and willingness of commercial banks and other financial intermediary institutions to lend to ECs during and beyond project period	S	Use of guarantee mechanisms to share risks, with high initial coverage, and dissemination of results. Starting with conservative leverage to gain confidence in the guarantee program among

		lenders; TA and training for lenders and ECs and preparation of project pipelines
Regulatory risks, notably timeliness and adequacy in approval for tariff adjustments	S	Upstream consultation with ERC and TA for rural electrification regulation; stakeholders consultation, strategic communications on reforms and consumer education
From Components to Outputs		
Willingness and ability of private investors to submit high quality IMC bids and secure sufficient equity	H	Careful screening of Type B ECs to ensure profitability potential; guarantee to facilitate access to local debt financing; pre-qualification of IMC investors; TA.
Ability of ECs to find suitable energy efficiency investments	N	
Overall Risk Rating	S	

Risk Rating - H (High Risk), S (Substantial Risk), M (Modest Risk), N(Negligible or Low Risk)

Given the paradigm shift in strategic approach to the energy sector and ECs, there are a number of risks associated with this project. Proper analysis of risks associated with the project and rigorous design of bidding documents, guarantee provisions, and legal frameworks which clearly assign various project risks will be an essential aspect of further project preparation work. Key risks include:

- *Ability to attract sufficient quality IMC bidders*: Global realities indicate that private sector investor interest in the energy sector, and rural distribution sub-sector in particular, is weak. Without a strong number of quality IMC proposals, it is unlikely that this alternative model can be properly tested or have good prospects for success. Furthermore, it remains uncertain whether the selected ECs will be able to attract quality bids to ensure attractive terms. During project implementation, careful screening of potential IMC pilot candidate ECs and a clear IMC contractual and regulatory frameworks will help ensure a high potential for commercial returns on equity, would be selected. Ongoing dialogue with potential investors, which include local distribution utilities, indicate that the proposed loan guarantee facility would help reduce the perceived risks to them and greatly enhance their ability to access affordable local term debt financing for needed investments. As EC subprojects would involve existing systems, as opposed to greenfield projects, their risk profiles would be lower than other rural electrification projects. Proper preparation of EC system data and bidding documentation, sufficient lead times for advertisements and bid preparation, strong program marketing, easy access to technical information on ECs, etc. will also help ensure that investor responses are strong.
- *Ability for Type C ECs to turn around operations*: Type C ECs, which are, by definition, not yet able to attract private investors, require substantial capital to improve their operations and networks. However, it is not certain that access to financing alone, without any other form of management/operational intervention, would be sufficient to bring them to full creditworthiness. The partial loan guarantee proposed would improve their ability to access affordable term financing. Extensive efforts will also be made to screen potential EC borrowers to ensure that only those with strong management performance and reasonable financial positions would be eligible for the program. If appropriate, some managerial actions may need to be proposed by the local bank as loan conditions and taken by EC management in order to access the loan guarantee facility. Since the program will be implemented as a pilot, strict adherence to developed screening criteria will be critical to ensure early successes.

3. Possible Controversial Aspects:

None.

G. Main Conditions

1. Effectiveness Condition

- Adoption, by DOE, its Project Implementation Plan and financial management system for this project, satisfactory to the Bank.
- The execution of a Guarantee Program Implementation Agreement, between DOE and LGUGC, with terms and conditions satisfactory to the Bank.
- Adoption, by LGUGC, policies and operating guidelines for the Guarantee Program, with terms and conditions satisfactory to the Bank.
- Revised financial accounting manual and chart of accounts of LGUGC to incorporate the project requirements and procedures, satisfactory to the Bank.
- Amendment, by NEA, its Implementation Rules and Regulations of EC collateral sharing policy, satisfactory to the Bank.
- Creation of the Project Supervisory Committee (PSC) and Technical Working Group (TWG) for the project.

Conditions of Negotiations

- Establishment by LGUGC a PMO, with functions and staffing satisfactory to the Bank.
- Adoption, by DOE and LGUGC, Environmental Policy Framework, Policy Framework: Land Acquisition, Resettlement and Rehabilitation of Displaced Persons, and Project Policy Framework on Indigenous Peoples for this project.

Triggers for Tranche Release of Guarantee Reserve Fund

- First tranche: $5 million, upon the execution of a Guarantee Reserve Escrow Agreement, among the Recipient, LGUGC and the Escrow Agent, satisfactory to the Bank; and
- Second and last tranche: $5 million, upon execution of loan guarantee agreements between LGUGC and lenders for eligible EC subprojects, with guarantees committed totaling $4 million.

2. Other [classify according to covenant types used in the Legal Agreements.]

Legal Covenants

- DOE and LGUGC shall furnish the Bank with (i) quarterly progress reports within 60 days after the end of each quarter, commencing the quarter that ended September 30, 2004; and (ii) a Mid-Term Review report by March 31, 2008.
- LGUGC shall ensure that the EC subprojects, which receive partial credit guarantees under the Project, comply with the environmental and social policy framework adopted for this Project.
- The first four subprojects of the guarantee program, and at least one non-EC loan guarantee subproject, will require approval by the Bank prior to approval by LGUGC.
- LGUGC shall prepare and furnish to the Bank a financial management staffing plan for the project, satisfactory to the Bank, by June 30, 2005, and carry out such plan by September 30, 2005.
- LGUGC will maintain profitable operations as an on-going concern.
- LGUGC will not leverage outstanding guarantees committed under the Partial Credit Guarantee Program beyond 5:1 to the Guarantee Reserve Account.
- LGUGC will not provide cash dividends until such time that its capital plus unappropriated retained earnings shall be at least 500 million pesos.

- In the event the cumulative amount of guarantee payments reaches $1.5 million under the Partial Credit Guarantee Program, LGUGC will have to develop and implement a remedial action plan, satisfactory to the DOE and the Bank, with the aim to reduce the guarantee claims in the future. In the event the cumulative amount of guarantee payments reaches $3 million, this will trigger suspension of new loan guarantee by LGUGC, and new loan guarantee commitment will not resume until DOE develop and implement a remedial action plan, satisfactory to the Bank.
- The Recipient may keep in perpetuity grant proceeds disbursed to it under the Guarantee Reserve Account, but only for the purposes of: (i) continuing the EC loan guarantee program; or (ii) using such funds in a manner satisfactory to the Bank and in accordance with a plan provided to the Bank by December 31, 2010 for the future use of such funds, consistent with the objectives of reducing greenhouse gas emission in the Philippines, and revised, as necessary, by the Closing Date to fully incorporate the comments of the Bank.

H. Readiness for Implementation

☐ 1. a) The engineering design documents for the first year's activities are complete and ready for the start of project implementation.
☒ 1. b) Not applicable.

☐ 2. The procurement documents for the first year's activities are complete and ready for the start of project implementation.
☒ 3. The Project Implementation Plan has been appraised and found to be realistic and of satisfactory quality.
☐ 4. The following items are lacking and are discussed under loan conditions (Section G):

I. Compliance with Bank Policies

☐ 1. This project complies with all applicable Bank policies.
☒ 2. The following exceptions to Bank policies are recommended for approval. The project complies with all other applicable Bank policies.

Waiver of the Bank's disbursement policies (OP12.00 and OP14.40) was approved by Bank management for the up-front disbursement of funds into a Guarantee Reserve Account. As in the case of similar GEF-financed projects, such disbursement is essential for this project to proceed, in order for the guarantee program to have credibility in the market, capacity to underwrite credit risks from commercial bank loans to ECs and meet guarantee call claims in full and timely when they arise.

Selina Wai Sheung Shum	Junhui Wu	Robert V. Pulley
Team Leader	**Sector Manager**	**Country Director**

Annex 1: Project Design Summary

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Hierarchy of Objectives	Key Performance Indicators	Data Collection Strategy	Critical Assumptions
Sector-related CAS Goal: 1. Improved rural infrastructure services to improve living standards and contribute to poverty alleviation	**Sector Indicators:** • Improved EC service quality, as indicated by the frequency of power supply interruptions • Socio-economic benefits accrued to households and local communities	**Sector/ country reports:** • DOE/NEA and EC statistics • Project progress reports • Household surveys	**(from Goal to Bank Mission)** • Reliable electricity supply is an important input to poverty alleviation in rural areas
2. Strengthened private sector participation	• Increased private investment and management of ECs/reduced need for public support of ECs		• Favorable investment climate and sufficient participation by commercial lenders and private equity investors
3. Global Environment Goal: achieve greenhouse gas (GHG) reduction	• Quantified reductions in emissions and local pollutants from energy efficiency investments		• GHG mitigation programs protect the global environment
GEF Operational Program: #5 Energy efficiency and energy conservation	**Outcome / Impact Indicators:** • Aggregate commercial investments in EC efficiency improvements • Quantified energy (GWh) savings	DOE/NEA and EC statistics and investment reports	• Stable macroeconomic and political conditions
Global Objective: Reduction of greenhouse gas emissions	**Outcome / Impact Indicators:** Quantified reductions in CO2 emissions	**Project reports:**	**(from Objective to Goal)**
Development Objective: Achieve significant and sustained energy efficiency improvements in rural ECs	• Energy savings: at least 80 GWh annually by the end of the project • Carbon dioxide emissions avoided: at least 40,000 tons annually by the end of the project • Indicators for energy efficiency improvements include reduction in system loss	• DOE, EC, Guarantor project progress reports • Supervision missions • Results of IMC negotiations and performance	**Development and Global Objectives to CAS** • Stable macroeconomic conditions • Appropriate energy pricing/ distribution regulation • Private sector willingness to invest in EC businesses Improved banking and local capital markets

Output from each Component:	**Output Indicators:**	**Project reports:**	**(from Outputs to Objective)**
1. Partial Credit Guarantee Program	• At least $25 million of loan guarantee issued • At least $40 million of investment in ECs • At least 4 commercial banks and other financial institutions providing loans to ECs • Not more than $3 million of cumulative guarantee claim payments	• DOE, EC, Guarantor project progress reports • Supervision missions • Results of IMC bids	• IMC investor ability to turn-around EC operations • ECs ability to turn-around operations with loan guarantees • No future political interference in EC operations Stable energy demand in EC territories
a. IMC pilots b. EC loan guarantees	• At least 6 IMC transactions • At least 15 loan guarantees issued for ECs		
2. Capacity building	Technical assistance and training programs developed and delivered	• DOE, EC, Guarantor project progress reports • Supervision missions	• ECs can maintain efficiency improvements beyond IMC contracts and project period • Ability of banks to lend beyond project period

Hierarchy of Objectives	Key Performance Indicators	Data Collection Strategy	Critical Assumptions
Project Components / Sub-components:	**Inputs: (budget for each component)**	**Project reports:**	**(from Components to Outputs)**
1. Partial Credit Guarantee Program		• DOE, EC, Guarantor project progress reports	• Willingness and ability of private investors to submit high quality IMC bids and secure sufficient equity
a. Eligible EC subproject investments	1a. Total cost $50 million	• Supervision missions	
b. Partial Credit Guarantee Facility	1 b. $10 million (GEF): of which:. $5 million for EC loans and $5 million for non-EC loans (notably IMC investors)	Bank disbursement reports	• Willingness of commercial banks to lend to qualified IMC investors and ECs
			• Ability of ECs to find suitable efficiency investments
		• DOE, EC, Guarantor project progress reports	• Selection of high quality guarantor
		• Supervision missions	• Interest by banks in lending to ECs
		• Bank disbursement reports	
2. Capacity building	2. Total cost: $2.3 million: of which GEF: $2M, DOE: $0.20M, LGUGC: $0.1 million		

Annex 2: Detailed Project Description

PHILIPPINES: Electric Cooperative System Loss Reduction Project

The main objective of the Project is to achieve significant and sustained energy efficiency improvements in ECs in order to provide current and prospective viable EC customers with reliable and least-cost power supply over the long term. Towards this end, the project would (i) develop and test financial and contractual mechanisms to support private sector investment, management and operation, and risk sharing to support system loss reduction measures in selected ECs; and (ii) support commercial lending to qualified ECs for efficiency improvements. For (i), the project would pilot the use of IMCs to attract non-EC private investors to manage and operate selected ECs under long-term, performance-based contracts, and to mobilize private finance without recourse to the government. For those ECs that are yet unable to attract private investors, access to affordable term loans would be facilitated under (ii).

The Project would consist of two components: (a) establishment of a partial credit guarantee program; and (b) capacity building and implementation support.

By Component:

Project Component 1 - Partial Credit Guarantee Program - US$10.00 million

The Project will establish a credit guarantee program to support financing of economic power distribution system upgrade projects for selected ECs, which would achieve substantial reductions in power losses, improve distribution system efficiency and hence reduce GHG emissions. The guarantee program will be managed by LGUGC, which will serve as the Guarantee Program Manager. The guarantee program will be available to support loans from commercial banks. A main goal of the program is to recruit commercial lenders to the EC market and demonstrate the viability of EC project finance. The partial guarantees will partially mitigate borrower credit risks and assist commercial banks to enter this market and to provide financing with extended loan maturities and reduced collateral requirements.

(a) Criteria for Eligible Borrowers

Potential borrowers will be assessed case-by-case for their credit worthiness and management capacities. Two broad categories of eligible borrowers include (i) ECs; and (ii) non-ECs.

(i) ***ECs***. For selected ECs which are projected to be financially viable but unable to attract private risk capital or satisfy the collateral requirements of commercial banks, the credit guarantee program under the project would facilitate their access to commercial debt financing and thereby break the vicious cycle of under-investment for rehabilitation. Eligible ECs would have fairly good managers, a demonstrated ability to act independently of political influence, a desire and commitment to improve operational efficiency and an inherently viable structure (e.g. required consumer mix and network characteristics for profitable operations).

(ii) ***Non-ECs***. An innovative approach to attract private sector investment is through IMCs, although other non-EC private investors may also be considered for credit guarantee under the Project. A recently completed feasibility study confirmed the potential for IMCs to be implemented at selected ECs, the management of which has been taken over by NEA due to their poor management and financial performance. Under the IMC contracts, the investors will assume full management and profit and loss responsibility for EC operations, accountable to the EC Board, over the long term contract term (expected to be 10-15 years). The IMC investor will be responsible for mobilizing financing for capital investment from its own equity, from debt with the IMC investor as borrower, and from internally generated EC revenues. The IMC would, by design, provide incentives for efficiency through performance-based remuneration, enhance the accountability of service providers and mobilize private

finance. In some cases, two or three contiguous ECs may be consolidated under a single IMC solicitation.

(b) Credit Assessment & Underwriting Criteria

Potential borrowers will be assessed case-by-case for their credit worthiness and management capacities. Credit assessment, both by the lenders and by LGUGC as the Guarantee Program Manager, will be based on a set of underwriting and credit analysis criteria developed through consultations between LGUGC and potential lenders and represent a key component of the Operations Manual.

Underlying principles of the guarantee facility would include: (a) the guarantees would provide risk mitigation to lenders, and therefore investor borrowers, to support energy efficiency investments; (b) the guarantees would leverage on existing banking credit assessments expertise and improve terms and access to financing and extend maturities for borrowers; (c) the guarantee coverage required would be determined flexibly (up to 80 percent) depending on the nature of each borrower/EC, relative status of the EC and risk perception of lenders; and (d) the guarantee liabilities for a given transaction would be decreased over the life of the loan, in line with scheduled principal amortization. The guarantee facility would charge investors appropriately priced guarantee fees. These fees will be used to defray administration costs and serve as part of loss reserve for the guarantee program, allowing for preservation of the GEF capital.

(c) Eligible Subprojects

The Project will seek to apply criteria for eligible projects that balance the GEF objective of achieving energy and emissions savings with the ECs' commercial requirements. The following criteria will determine eligible EC subprojects that can be supported by the guarantee program.

(i) Eligible EC subprojects must be for power system distribution upgrades. Subprojects which do not directly, or are not necessary to, the upgrade of the distribution system will not be eligible.
(ii) At least 50 percent of the investment amount must be for subprojects which result in direct and measurable energy (kWh) savings.

These criteria will be reflected in DOE's Project Implementation Plan and LGUGC's Operational Manual. The Bank will require prior review of the first four subprojects to ensure full adherence to all agreed eligibility criteria.

(d) Guarantee Program Structure

Structure of Guarantees. The EC serves as a public utility, providing an essential service, delivery of electric power. The key feature of the guarantee program reflects these inherent features of the EC business.

Loan Guarantee Agreements (LGAs) will be entered into between LGUGC, the Guarantee Program Manager, and the lending bank. Standard LGA specific to this program will be developed by LGUGC and included in the Operations Manual, building on the existing documentation and experience of LGUGC, adapted to this EC sector. Based on research to date, discussion with the Guarantee Program Manager and lenders and assessment of EC project finance needs and credit characteristics, key terms of the guarantee program would include the following.

- Guarantee Program Leverage Ratio – This is targeted to go beyond 1:1 depending on perception of prospective lenders on the creditworthiness of the guarantee program; to be prudent, the maximum leverage ratio for the program is not expected to exceed 3: 1 by the end of project implementation. Nevertheless, this 3:1 maximum leverage ratio can be reviewed and possibly increased based

on experience.

- Guarantee Coverage – Partial, up to a maximum of 80% of principal and interest outstanding.
- Fees – Guarantee fee will be determined on a case-by-case basis, reflecting risks associated with the specific borrower and the Program in general. An indicative minimum guarantee fee is 1.5% per annum. A front-end fee (indicative at 1%) shall also be considered.
- Guarantee Term – The term of the guarantee will coincide with that of the debt, which is currently estimated at 3-7 years with provision for grace periods. Maximum guarantee term shall be 10 years.
- Guarantee Call – The basis for this call are the default provisions to be agreed between the Guarantor and the lenders, acceptable to the Bank.
- Guarantee Payments – As part of the security arrangements on individual loans, the borrower will be required to establish deposit accounts and/or escrow accounts for debt service reserves. Prior to any payments upon the guarantee call, the Guarantee Program Manager will verify with the lenders if the borrower's escrow and deposit accounts have been fully exhausted.
- LGUGC will take a pro-active role, in coordination with the lender, to monitor borrower finances and loan performance, and work out proceedings to correct default situations.
- Environmental and Social Policy Safeguard – DOE and LGUGC adopt the same policy framework, namely Environmental Policy Framework, Policy Framework: Land Acquisition, Resettlement and Rehabilitation of Displaced Persons, and Project Policy Framework on Indigenous Peoples prior to grant negotiations.

Bango Sentral ng Pilipinas (BSP) Regulations. The guarantee program will be operated and LGAs written consistent with BSP regulations. These will address several items including definitions for non-performing loans and defaults, limits on the loan grace period, capital adequacy requirements for Guarantee Program Manager, use of guarantee to substitute for lender's loss provisioning and other terms. LGUGC will be required to assure this compliance.

(e) Institutional Arrangements

Guarantee Program Manager Responsibilities and Operational Functions. LGUGC, the selected Guarantee Program Manager, will have primary responsibility for operation of the guarantee program under the project. Principal guarantee program operations and management program functions will include: (1) loan and guarantee transaction origination; (2) program marketing; (3) recruitment of new lenders; (4) loan guarantee administration and monitoring; (5) track energy savings and carbon emission reductions; (6) procure and supervise related technical assistance efforts; (7) liaise with other program stakeholders; (8) management and oversight of Guarantee Reserve Account, Interest Earning Account and the Guarantee Revenue Account: (i) direct reinvestment of funds in the Revenue Account and oversee investment by the Escrow Agent of funds in the Reserve Account, within permitted investments guidelines agreed with DOE and the Bank; (ii) review the account activities of the Guarantee Reserve Account, the Interest Earning Account and the Guarantee Revenue Account; and (iii) report on progress to DOE and the Bank.

Guarantee Program Manager Management and Governance. LGUGC will operate this program as a distinct program and product line separate from its core business of guarantees for local government debt. Separate accounts will be used for all operating budgets and guarantee liabilities and guarantee reserve assets. A Project Management Office (PMO), headed by a director, will be established prior to grant negotiations. Additional financial analyst and support staff will be hired as needed for this program. Senior management and back office support for the program will also be provided by LGUGC. The Program Manager will also have access to legal, engineering and financial consultants hired with TA resources. LGUGC will establish a Credit Committee for making formal credit decisions on EC project guarantee applications.

LGUGC Board of Directors will have ultimate responsibility and accountability to the DOE and the Bank, pursuant to the Guarantee Program Implementation Agreement on all matters including: (a) approval of new lenders into program; (b) approval of guarantee transaction origination and credit analysis underwriting guidelines; (c) approval of specific transactions, addressing matters of policy and compliance as they arise with participating banks; (d) addressing matters of policy and compliance with external program contractors; (e) management of GOP/Bank relations, reporting and missions/meetings; (f) management of all budget, financial, asset/liability, reporting and personnel matters; and (g) periodic review of program operations and performance. Authority to execute Program related legal documents would be based on the decisions and delegations by LGUGC Board.

Operations Manual. As a key aspect of its start-up tasks, LGUGC will prepare an Operations Manual, which would define program procedures, project and borrower criteria, underwriting and guarantee guidelines, application forms, and other key data relevant to the credit analysis and project appraisal process for dissemination among potential lenders and project sponsors.

Permitted Investment Guidelines. LGUGC will oversee the investment of the funds in the Guarantee Resrve Account and Interest Earning Account. Unless otherwise agreed with the DOE and the Bank, the investment will be denominated in US Dollars, and limited to US government or Philippine government debt instruments.

Program Term and "Exit Strategy" for GEF Funds. The Project operations period is scheduled for about seven and a half years to allow sufficient time to originate transactions. TA efforts will be front-end loaded during this period to generate project deal flow. The operations period is the "availability period" during which new guarantees will be originated under the guarantee program and the period of TA activities. After new guarantees cease to be issued, the guarantee program must continue to operate until all guarantee liabilities and underlying loans have matured. The program has been designed to be self-sustaining from program income, i.e., interest earnings and guarantee fees in the latter years.

An agreement was reached with the government that it may keep in perpetuity grant proceeds disbursed to it under the Guarantee Reserve Account, but only for the purposes of: (i) continuing the EC loan guarantee program; or (ii) using such funds in a manner satisfactory to the Bank and in accordance with a plan provided to the Bank by December 31, 2010 for the future use of such funds, consistent with the objectives of reducing greenhouse gas emission in the Philippines, and revised, as necessary, by the Closing Date to fully incorporate the comments of the Bank.

Guarantee Program Sustainability and Replication. Future potential program sustainability and replication can be facilitated from the following options which will be discussed and incorporated into the program design, as appropriate:

- Performance of guaranteed loans is satisfactory and the EC partial credit guarantee program increases the leverage ratio (maximum guarantee liabilities to [GEF] guarantee reserve funds).
- Lenders come to understand and accept EC credit risks and lend without guarantees; the program will seek to recruit and engage new commercial lenders in the EC term loan market.
- The EC reform program succeeds and the pathway to EC sustainability is demonstrated.
- The IMC model works, and more commercial investors are mobilized, more ECs take this path, and IMC investors fund their investments without any guarantees on their debt.

Project Component 2 - Capacity Building and Technical Assistance - US$2.30 million

Activities under this component will include two subcomponents, implemented by LGUGC and DOE, respectively, as follows:

1. LGUGC subcomponent:

(a) Provision of technical assistance, training, study tours and workshops to LGUGC, financial intermediaries, selected electric cooperatives, and electric cooperatives investors (including investment management contractors), in transactions involving electric cooperatives, including screening of electric cooperatives, development of an economic power distribution system upgrades sub-project pipeline, and carrying out of feasibility studies and appraisal of economic power distribution system upgrades sub-project applications.

(b) Provision of technical assistance to LGUGC for the carrying out of workshops, market promotion, and information dissemination to electric cooperatives, financial intermediaries and investors on the investment management contract mechanism, the electric cooperatives improvement program and the credit guarantee program.

(c) Strengthening the capacity of LGUGC in Project implementation, including the provision of technical assistance, training, study tours, workshops and office equipment.

2. DOE subcomponent

(a) Provision of technical assistance to DOE for the carrying out of periodic reporting, monitoring and evaluation of the credit guarantee program, including the performance of investment management contractors and the service level performance of electric cooperatives, and the carrying out of an assessment of the energy efficiency gains of electric cooperatives from improved access to commercial lending.

(b) Strengthening the capacity of DOE and the NEA in Project implementation, including the provision of technical assistance, training, study tours, workshops and office equipment.

(c) Provision of technical assistance, training and workshops to DOE and the NEA on investment management contract transactions, including the development of bidding documents and contract management.

(d) Provision of technical assistance, training, study tours and workshops to the Energy Regulatory Commission in the preparation of regulations for electric cooperatives and investment management contracts.

(e) Provision of technical assistance, training, study tours and workshops to electric cooperatives in technical, operational and management aspects, including good governance.

Annex 3: Estimated Project Costs

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Project Cost and Financing

The total project cost is currently estimated at about $62.3 million, comprising: (1) Partial Credit Guarantee Program, including (a) eligible EC subproject investments of about $50 million; and (b) GEF fund to be disbursed as reserve to the partial credit guarantee program of $10 million; and (2) capacity building estimated at $2.3 million. Of this total, $2 million will be funded by GEF, including (i) $0.877 million implemented by LGUGC; and (ii) $1.123 million implemented by DOE.

	Local	**Foreign**	**Total**
Project Cost By Component	US $million	US $million	US $million
1. Partial Credit Guarantee Program			
(i) Eligible EC subprojects	28.25	21.75	50.0
(ii) Partial Credit Guarantee Facility	0.0	10.0	10.0
2. Technical Assistance	0.3	2.0	2.3
(i) LGUGC	0.1	0.877	0.977
(ii) DOE	0.2	1.123	1.323
Total Project Costs	28.55	33.75	62.3
Total Financing Required	50.3	12.0	62.3

Partial EC Credit Guarantee Program. $10 million of GEF funds will capitalize a Guarantee Reserve Account. Guarantees will be issued by LGUGC, backed by the strength of the reserve accounts for the Guarantee Program , including Guarantee Reserve Account, Interest Income Account and Guarantee Revenue Account. Based on the assumption that debt financing accounts for about 80% of total investments; partial credit guarantees covers up to 80% of debt financing for ECs and up to 50% for non-EC borrowers, the Guarantee Program would support eligible investments totaling about $50 million during the project implementation period, including (i) an estimated US$25 million in investment would be sought from non-EC investors (notably for IMC) for comprehensive improvements in EC operations and efficiency; and (ii) an estimated $25 million of investments from ECs.

Capacity Building Component
(in US$000)

Component	Activity	Activity Budget	GEF Portion
I. Incremental Operating Costs			
a. Guarantee Program Manager	Incremental costs for program start-up and operatior	$ 48	$ 38
b. DOE	Incremental operating costs	**$ 100**	**$ 80**
Total Incremental Operating Costs		**$ 148**	**$ 118**
II. Goods			
a. Guarantee Program Manager	Office equipment	$ 50	$ 45
b. DOE	Office equipment	$ 20	$ 18
c. ERC	Office equipment	$ 20	$ 18
Total Goods		**$ 90**	**$ 81**
III. Consultant Services			
a. Guarantee Program Manager	Program monitoring and evaluation services	$ 100	$ 87
	Program marketing and workshops for local FIs	$ 100	$ 87
	Audit	$ 6	$ 5
	Program implementation support	$ 177	$ 145
	Appraisal of subproject applications	$ 200	$ 164
	EC screening and project pipeline development	$ 250	$ 205
	TOTAL	**$ 833**	**$ 693**
b. DOE	Customized technical assistance to Type C ECs	$ 200	$ 174
	Program monitoring and evaluation services	$ 120	$ 104
	IMC/Program marketing	$ 100	$ 87
	Project Management	$ 25	$ 25
	Technical advisors	$ 124	$ 102
	TOTAL	**$ 569**	**$ 492**
c. ERC	EC Regulation (tariff etc)	$ 100	$ 87
	IMC Regulation	$ 100	$ 87
	Regulations	$ 50	$ 41
	TOTAL	**$ 250**	**$ 215**
Total Consultant Services		**$ 1,652**	**$ 1,400**
IV. Training			
a. Guarantee Program Manager	Guarantor/lenders/ECs	$ 100	$ 100
b. DOE	Training: DOE	$ 200	$ 200
c. ERC	Training: ERC	$ 100	$ 100
TOTAL Training		**$ 400**	**$ 400**
	Grand Total	**$ 2,290**	**$ 2,000**

Annex 4 Incremental Cost Analysis

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Overall Context for Energy Efficiency in the Philippines

The primary energy mix of the country is characterized by a heavy dependence on fossil fuel which accounted for some 52 percent of the total energy supply in 2002. The balance of the energy requirements were met by 5 percent hydropower, 7 percent geothermal energy and 31 percent other renewable energy. According to DOE's latest Philippine Energy Plan (2004-2013), the share of fossil fuel is expected to increase, accounting for about 62% of the total energy supply in 2013. As a corrollary for projected economic growth, demand for electricity is expected to increase from 48,467 GWh in 2002 to 111,210 GWh in 2013, at a rate of 7.1 to 8.4 percent annually. Energy consumption by power generation is projected to increase from about 58 million barrels of fuel oil equivalent (MMBFOE) in 2002 to 70 MMBFOE in 2013.

The energy sector accounts for over 26 percent of the country's total greenhouse gas (GHG) emissions. Due to the projected increase in electricity demand, GHG emissions from the power sector is expected to increase from 14 million tones of carbon dioxide equivalent (tCO_2e) in 1996 to about 60 million tCO_2e in 2010 and 133 million tCO_2e in 2020 (under a business as usual scenario). This is based on an average carbon intensity for grid-based electricity of 0.569 kg of CO_2e/kWh. The rural power sector, represented by poor efficiencies and lack of capital investment, contributes a disproportionately large amount to these emissions. In fact, rural power, especially in remote island areas, is characterized by a high dependence on diesel or bunker fuel for generation, resulting in a higher carbon intensity than the Philippine energy sector as a whole. Over the past decade, connections in rural areas have substantially increased, representing a majority of new connections in the country, thus increasing the countries emissions of GHGs at a rapid pace. It is expected that the 119 ECs serve over 4 million households nationwide today.

In 1996, energy efficiency and demand-side management (DSM) practices represented energy savings that were equivalent to approximately 3 percent of the total power generated. This figure is expected to rise to 9 percent in 2010 but drop to 7.5 percent in 2020. An increase in energy efficiency and DSM activities of 1 percent could represent a reduction in GHG emissions of approximately 600,000 tCO2e and a 0.5 percent decrease in national emissions. Efficiency improvements in EC networks could, therefore, represent a strong source of potential GHG emission reductions that are marginally better than other efficiency improvements in urban and peri-urban energy suppliers in the Philippines.

Concept and Barrier Removal Strategy

The main objective of the Project is to achieve significant and sustained energy efficiency improvements in rural electric cooperatives. To this end, the project proposes two components: (a) establishment of a partial credit guarantee program, and (b) capacity building and project implementation support for the key stakeholders, including DOE, NEA, ERC, participating ECs, commercial banks amd other financial institutions. These GEF financed activities would enable the: (i) development and implementation of a financial and contractual mechanism, namely IMCs that will support private sector investment, management and operation, and risk sharing to support system loss reduction measures in selected ECs; and (ii) support of commercial lending to other qualified ECs for efficiency improvements. The outcome of this project will be demonstration of alternative management contracts and financing instruments that facilitate commercial energy efficiency investments in selected ECs.

The global objective of this project is to reduce GHG emissions through the removal of barriers to energy efficiency and system loss reduction investments in the rural power distribution sub-sector, thus contributing to GEF's climate change goals. Significant global environmental benefits can be achieved by

reductions in the system losses currently experienced by many rural ECs in the Philippines and upgrades across their networks. The gains associated with such energy efficiency measures have been successfully captured by public and private sector entities in other developed countries, at low financial and economic costs. The local objective of this project is to transform EC into financially self-sufficient entities over the longer-term and provide the 7,000 islands (spread over 300,000 square kilometers) reliable electricity services.

Electrification is a capital intensive undertaking. The ECs are in constant need of long-term investment funds to rehabilitate and upgrade their distribution systems. In the past, the NEA financed about 90 percent of the ECs' funding requirements. However, the NEA is currently faced with serious liquidity problems and its role to provide credit to ECs has been curtailed. In accordance with EPIRA, Executive Order 119 (EO 119) provides for strengthening of EC services and performance. The ultimate objective is to attain the transformation of EC into empowered, competitive, efficient and financially viable organizations through significant improvements in the following areas:

- Management and institutional strengthening by:
  - (i) developing a performance based incentive system to motivate EC's Board of Directors, management and employees; and
  - (ii) developing objective and transparent criteria for hiring and promoting managers, employees and election of boards of directors.
- Setting platform for EC financial self-sufficiency through:
  - (i) developing investment strategy to seek financially viable investments and prioritize capital expenditures based on financial rate of return; and
  - (ii) achieving profitability by maximizing operational efficiencies and revenues.
- Improving operating efficiencies and customer service quality through:
  - (i) reducing operating costs through improvement in technical and non-technical losses levels and improving worker productivity through financially viable investments; and
  - (ii) improving customer service quality, supply system reliability and power quality through financially viable investments and effective consumer service handling.

Deployment of this new approach in the Philippines faces significant barriers, in particular the perceived incremental risks by financiers to participation in the innovative financing structures of energy IMC and general investments in upgrades to marginally viable (Type C) ECs that cannot attract outside financing. For those ECs that are being considered for an IMC the major barriers include: (i) inadequate investor confidence with EC assessment of baseline system performance; (ii) EC community skepticism about private sector management and potential benefits; (iii) GOP/EC community uncertainty about investor's ability to operate an EC; (iv) investor uncertainty about entering into long-term contracts with ECs; (v) limited access to affordable financing for investors to undertake large-scale investments in marginally viable ECs; and (vi) high perceived commercial risks associated with taking over EC operations. Type C ECs are characterized as having: (1) limited creditworthiness and corresponding lack of willingness by local commercial banks to provide affordable term financing for efficiency investments; (2) inadequate management ability to maintain efficiency gains; and (3) limited technical expertise to develop and implement energy efficiency improvement projects.

The GEF funding will be used to address the barriers noted above and, in particular, ease commercial lending for these perceived high risk transactions through partial loan guarantees. The funds will significantly leverage private sector resources and, after project implementation, funds will remain for replication and/or be redirected to the benefit of the Philippines and the global environment. Risks to the GEF guarantee funds will be mitigated by a risk-sharing arrangement with beneficiaries of the guarantee, as well as sound management during implementation by qualified institutions and individuals. The TA activities will support the implementation, administration, monitoring and evaluation of the system

efficiency pilot projects as well as dissemination of results for further replication in subsequent phases. In addition, this Project would test mechanisms to attract private sector participation and investment in ECs while reducing market barriers of policy, information, institutional capacity and financing that hinder the wider adoption of sound energy efficiency practices within this sub-sector.

Description of the Contingent GEF Financing Modality

Approximately 80 percent of the GEF grant will be used for a contingent financing modality, namely a commercial loan partial credit guarantee program. US$10.0 million will be used as a "contingent grant" to capitalize a reserve account to guarantee commercial loans for energy efficiency projects among ECs. This facility is deemed necessary due to the high perceived risks by commercial lenders and private investors to invest in these types of businesses.

The contingent financing modality for this Project builds upon several concepts, also used in the case of the GEF China Second Energy Conservation and GEF Romania Energy Efficiency Projects, whereby:

- *Gross Contingent Gran*t. The initial GEF grant to support the capital reserve of the proposed loan guarantee facility is a gross grant ($10.0 million proposed for this purpose). The distinction between a conventional grant and this contingent grant is that the latter will be partially or fully returned to the initial beneficiary, or otherwise redeployed (e.g. perhaps for other types of guarantees), at the end of the Project, for uses in other GHG reduction programs as agreed with the Bank and GEF.
- *Final or Net Gran*t. At the end of the Project, as much of the contingent grant as possible will be redeployed for use in other agreed GHG mitigation projects. The amount which is not returned for redeployment will be regarded as the Final Grant (and represent reserve losses from net defaults less net guarantee fees and interest earnings). While estimates have been prepared on the basis of reasonable assumptions and expected performance of the facility, the size of the Final Grant cannot be known with any precision until the end of project implementation.
- *Incremental cost.* The incremental cost associated with the contingent grant for the capital reserve is equal to the difference between the future value of the Gross Grant and the money that is returned at the end of the project. Since the Final Grant will not be known until project closure, the incremental cost also will not be known until the project closing date.

The advantage of the contingent finance approach is its inherent capacity to match the net GEF grant with the actual incremental costs stemming from project risk. The incremental cost payments of the Final Grant will be limited to the amount required to actually overcome the barriers to more sustainable commercial financing of the EC sector and energy efficiency investments, as borne out during actual market conditions and project implementation. All other funds will be returned or redeployed to meet other incremental cost payments.

Incremental Costs

Implementation of the barrier removal strategy would require funding of incremental costs, which would be the difference between the cost of implementing the baseline scenario versus that of the GEF Project Alternative. GEF funds will support part of this incremental cost. Descriptions and explanations for the baseline scenario, GEF Project Alternative and incremental costs are further elaborated below.

Baseline Scenario

Historically, all ECs were managed centrally by NEA, but over time more and more financial and management responsibility was placed in the hands of the individual ECs. Ongoing sector restructuring and the accumulation of bad debt have necessitated NEA to privatize many EC requiring financial self-sufficiency. At the same time, NEA filed for bankruptcy protection due to the accumulation of this bad debt forcing ECs to shift away from public borrowing and now pursue private investment and commercial lending. Thus reliance on NEA for management and financial support will not be an option in the future.

It is assumed that most, if not all, Type B and C ECs will be unable to attract outside financing for system efficiency improvements without some form of risk-sharing agreement (such as a commercial loan guarantee mechanism). A mechanism of this nature does not currently exist in the Philippines. Thus, the implication of this baseline scenario is that there will be continued under-investment in commercially-oriented efficiency improvements without some form of intervention by the GEF.

Under the baseline scenario, the ability of ECs to work with commercial financing and utilize cost effective energy efficiency technology is constrained by multiple barriers, but perhaps most significant: (i) lack of investment grade ECs, and (ii) inadequate financing mechanisms for private sector debt or equity investors. In addition the baseline is characterized as:

- EC cash flow deficits and financial distress (or significant tariff increases), with little or no funds for investment or debt service;
- Status quo EC creditworthiness and private sector investment (limited penetration of long-term contracts);
- Continued deterioration in the physical infrastructure, with increased outages, wastage, and high economic costs;
- Status quo EC management and performance, leading to limited technical improvement (system improvements, maintenance, modernization, etc.) and implementation of energy efficiency projects; and
- NEA obliged to provide management support and funds to sustain service to consumers (in an environment of diminishing financial resources).

Further, ECs are expected to continue the electrification process during this time while not providing additional resources for improvements and/or major repairs to generation, transmission, and distribution systems. Thus, system losses are expected to increase in the coming years and the *baseline* may actually erode over time, increasing emissions of GHGs. NEA has signaled that in the future they will no longer be in the position to provide debt to ECs, and the Rural Electric Finance Corporation (REFC) has stated that they will only be interested in lending to creditworthy, financially self-sufficient (Type A) ECs.

Under these circumstances, ECs will not be able to invest in critical system upgrades and loss reduction measures (or attract outside capital for this purpose) which would otherwise lead to significant energy efficiency gains. Limited financing and internally generated cash will likely be used towards critical repairs and extended coverage to additional households, rather than to support of existing networks. Type B and C ECs will continue to rely on public sector funding in order to conduct minor repairs and improvements, which will become less and less available over time. *Thus, total estimated cost for implementation of the baseline scenario is US$0.* Under this scenario, no investments are expected to be directed to system efficiency improvements, and it can be expected that system efficiencies will actually continue to erode over time. (The baseline for this activity is derived from a market penetration and business plan model for ECs without the ability to access IMC's or other financial vehicles for system improvements without the utilization of the partial credit guarantee.)

GEF Project Alternative

The GEF Project Alternative is derived from a market penetration and business plan with two components: (a) establishment of a GEF partial-credit guarantee program and reserve account; and (b) a capacity building component. The implication of this GEF Project Alternative is that the private sector will be able to actively participate in commercially-oriented development among eligible ECs.

Partial Credit Guarantee Program. The partial credit guarantee facility ($10 million) would provide risk mitigation to lenders to EC and IMC investor borrowers in support of the energy efficiency investments and IMC contracts, thus minimizing the risks that are beyond the control of commercial financiers. Under this facility, two windows would be developed: one for Non-EC borrowers (notably IMC investors) and one for eligible ECs. The objective would be to facilitate commercial lending for EC system upgrades by facilitating access to affordable term financing by commercial banks and other financial institutions. Thus, incremental risks for financiers associated with the baseline will be addressed. Selected money-losing ECs would be potentially turned around resulting in significant improvements in system efficiency levels. Many of the planned projects financed by new investment will directly result in system loss reductions. Improved efficiencies and freed-up cash flow would allow for (i) ECs to service current debt and repay arrears, and (ii) extension of service, where viable. If successful, these mechanisms can be replicated in other ECs, having demonstrated the usefulness of loan guarantees and commercial lending for system efficiency improvements that lead to energy savings.

Technical Assistance Component. Activities under this component ($2 million) will include two subcomponents, implemented by LGUGC and DOE, respectively, as follows:

1. LGUGC subcomponent:

(a) Provision of technical assistance, training, study tours and workshops to LGUGC, financial intermediaries, selected electric cooperatives, and electric cooperatives investors (including investment management contractors), in transactions involving electric cooperatives, including screening of electric cooperatives, development of an economic power distribution system upgrades sub-project pipeline, and carrying out of feasibility studies and appraisal of economic power distribution system upgrades sub-project applications.

(b) Provision of technical assistance to LGUGC for the carrying out of workshops, market promotion, and information dissemination to electric cooperatives, financial intermediaries and investors on the investment management contract mechanism, the electric cooperatives improvement program and the credit guarantee program.

(c) Strengthening the capacity of LGUGC in Project implementation, including the provision of technical assistance, training, study tours, workshops and office equipment.

2. DOE subcomponent

(a) Provision of technical assistance to DOE for the carrying out of periodic reporting, monitoring and evaluation of the credit guarantee program, including the performance of investment management contractors and the service level performance of electric cooperatives, and the carrying out of an assessment of the energy efficiency gains of electric cooperatives from improved access to commercial lending.

(b) Strengthening the capacity of DOE and the NEA in Project implementation, including the provision

of technical assistance, training, study tours, workshops and office equipment.

(c) Provision of technical assistance, training and workshops to DOE and the NEA on investment management contract transactions, including the development of bidding documents and contract management.

(d) Provision of technical assistance, training, study tours and workshops to the Energy Regulatory Commission in the preparation of regulations for electric cooperatives and investment management contracts.

(e) Provision of technical assistance, training, study tours and workshops to electric cooperatives in technical, operational and management aspects, including good governance.

The total estimated cost for implementation of the GEF Project Alternative is $12 million.

Total Incremental Costs

The total GEF Project costs are estimated at $62.3 million, which include the GEF grant, counterpart funding and leveraged commercial financing. However, the cost to achieve this project alternative would only represent the GEF share of this, or $12 million, since the other project costs represent leveraged financing from the GEF intervention. Thus, since the baseline costs are assumed to be $0, the full incremental cost would be $12 million. (See Table A4-1 for a full incremental cost matrix.)

Under the framework of the contingent financing modality and concept of gross and net grants, the net grant would be the portion of the GEF grant that is no longer available at the close of the project. Financial projections of the partial credit guarantee program conservatively estimates that about 10 percent of the total guarantee liabilities may result in a default, triggering payments from the GEF guarantee reserve fund. This represents total losses of $3.0 million in the guarantee reserve funds. (Although it should be noted, reserve losses and thus the actual net grant for the guarantee facility will not be known until project closure.) In addition, $2 million would be disbursed as a non-contingent grant for TA activities. Thus, the expected net or final grant would only be $5 million and the estimated incremental cost would be about $5.3 million by the end of project implementation.

An agreement was reached with the government that it may keep in perpetuity grant proceeds disbursed to it under the Guarantee Reserve Account, but only for the purposes of: (i) continuing the EC loan guarantee program; or (ii) using such funds in a manner satisfactory to the Bank and in accordance with a plan provided to the Bank by December 31, 2010 for the future use of such funds, consistent with the objectives of reducing greenhouse gas emission in the Philippines, and revised, as necessary, by the Closing Date to fully incorporate the comments of the Bank. Either option would result in additional global environmental benefits which have not been estimated in this analysis.

Table A4-1. Incremental Cost Matrix

	Baseline	GEF Alternative	Increment
Domestic Benefits	· Continued poor financial performance of ECs · Sustained and increasing EC system losses · No investments in EC network improvements	· Increased system efficiencies in selected ECs · Increased commercial investments in EC operations · Improved quality of rural electricity services	· 3-5 percent improvement in EC system efficiencies · Energy savings of 1,737 GWh · Increased private sector participation in EC operations
Global Environmental Benefits	No efficiency improvements/GHG reductions from ECs.	Reductions in GHG based on facilitating system efficiency improvements in EC networks.	0.8 million tons of carbon reduced.
Costs by Component (US$M)			
Guarantee Program	0.0	10.0	10.0
Commercial Debt/Equity	0.0	50.0	50.0
Technical Assistance	0.0	2.3	2.3
Total Costs	0.0	62.3	62.3
Total GEF Costs			
Guarantee Program		3.0	3.0
Technical Assistance		2.0	2.0
GEF Incremental Costs		5.0	5.0

Project Benefits: Energy Savings & Carbon Dioxide Emission Abatement

Project Benefits. Benefits of the GEF Project Alternative include the energy savings associated with the investments supported as well as the GHG emissions reductions. In addition, money losing ECs could be potentially turned around and significant improvements in system efficiency levels, management and operations achieved. Service in remote areas could be improved, tariffs reduced and system extension could be made in viable areas, providing a significant catalyst for further economic development in these communities. Improved power quality and reliability would also improve prospects for future end-use energy efficiency programs, since high-efficiency equipment often requires high quality and reliable power to function optimally. And, the rehabilitation of ECs would pave the way for more commercial and competitive services in rural areas through out the country.

The GEF Project alternative case, is derived from increased investment based on the business plan for the IMC model and the planned efficiency improvements. Based on a GEF Grant of $12 million ($10 million for guarantee reserves and $2.0 million for TA), the guarantee facility may be able to support $30 million in guarantee liabilities, assuming a guarantee liability to reserve ratio of 3:1 (defined as the maximum leverage of the guarantee) and a conservative default rate of 10 percent. Assuming a guarantee percentage of 80 percent maximum debt financing, the total possible capital for investment will be about $50 million for EC system improvements. Overall, this guarantee facility will result in substantial energy savings over

time. Efficiency investments made during the 7-year project period are estimated to save more than 1,737 GWh over a 15-year period. Preliminary calculations indicate that the energy savings benefits alone could result in direct financial benefits of about $65-80 million over the 7-year project period, based on an average retail tariff of 4 pesos/kWh. If other non-energy savings benefits are included, such as reduced labor costs, increased revenues and collections, etc. the financial benefits to the ECs will be substantially higher.

Emissions Reductions. Calculation of the associated reductions in carbon emissions is based on the projected energy savings associated with the investments made under the project. Based on a representative sample of EC technical assessments, it is assumed that the energy intensities of each EC could be reduced by an average of 25 percent (within the project period) after the investments have been made, which would lead to a corresponding reduction in carbon emissions. (These calculations do not include potential reductions in energy consumption if improved billing collections are achieved.) With average energy savings of 116 GWh per EC (over 15 years), about 52,000 tons of CO_2e could be saved annually, leading to over 778,000 tons of CO_2e over a 15 year period. (The carbon intensity for these investments would be reduced over time from 0.569 kg of CO_2e/kWh in the first year to 0.406 kg of CO_2e/kWh by year 7.)

Leveraging of GEF Funds. Through the guarantee program under the Project, GEF funds could be used to support more than US$50 million of investments, representing a ratio of 10:1 (expected investments to net grant) over the project period. However, given that a second generation of investments is likely to be made from improved finances of the participating ECs after these investments, along with increased commercial lending without requiring the guarantee facility, total leverage of GEF funds could be significantly higher.

Grant Cost Effectiveness. The net cost of carbon abatement for the project is a direct result of the leverage provided by the GEF grant. For investments made within the project implementation period, the *gross* cost of carbon abatement over 15 years would be about $15.43/ton of CO_2e. The *net* cost of carbon abatement for the same period is projected to be US$6.43 per ton of CO_2e.

Monitoring & Evaluation

The monitoring indicators of the Project will be of three categories. The first category will address both the quantity and quality of the credit guarantee program. Performance indicators will include the number and value of loans and credit guarantees, the number of commercial lenders and IMC transactions, the total amount of debt and equity investment mobilized, and the amount of net guarantee claims under the Project. The second category will measure greenhouse gas (GHG) mitigation impacts, including quantified energy savings and reductions in CO_2 emissions. The third category will address the socio-economic impact. Baseline data, including average household income, monthly expenditures on energy consumption and frequency of power supply interruptions, will be collected through household surveys at the outset of project implementation and compared with additional data to be collected during project implementation phase.

Monitoring and evaluation (M & E) of program results will occur on several levels. Monitoring of loan and guarantee performance will be conducted by the Guarantee Program Manager, LGUGC, in conjunction with participating lenders. Data on loan performance will be required to be reported as part of the implementing agreements between DOE and LGUGC , and between LGUGC and lenders in the loan agreements themselves. LGUGC will established a Project Monitoring Board to oversee loan performance, borrower financial performance and compliance with loan and guarantee agreements. Monitoring of the EC projects and the actual energy and carbon emissions savings achieved will be conducted by engineers retained as part of the TA efforts; this activity will be managed by DOE. Information requirements for

monitoring the EC projects and their energy and emissions savings will be established during guarantee origination and project participants will be required to provide access to necessary information post-implementation. In addition, DOE will oversee the monitoring and evaluation of the socio-economic impact of the Project, including the commissioning of household surveys and related analysis of data collected.

Quantitative performance indicators would include:

- Total number of subprojects financed under the program;
- Total value of EC investments supported;
- Total number and value of IMC transactions supported;
- Total number and value of loans, broken down by ECs and non-EC borrowers, supported;
- Total number of commercial banks and other financial institutions participating;
- Payment performance of guaranteed loans;
- Actual losses incurred and guarantee claims payments made;
- Total value of energy efficiency investments supported;
- Energy saved in projects guaranteed;
- GHG emissions avoided due to projects guaranteed under the facility; and
- Frequency of power supply interruptions at individual ECs.

A Mid-term Review will be commissioned by DOE, with the assistance of consultants. This evaluation will review the entire Project, both guarantee and technical assistance programs. DOE will be assisted by an M & E consultant who will be hired during the first year of program operations in order to further establish the monitoring and evaluation plans, confirm baseline conditions, and assure that necessary information for conducting the evaluation will be collected during the course of program operations. Mid-term evaluation results will be used to make improvements in project implementation.

Annex 5: Financial Summary

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Guarantee Structure and Funds Flow Arrangements of the Guarantee Program

Loan Guarantee Administration and Recovery Actions and Costs. LGUGC will be responsible, as Guarantee Program Manager, to proactively conduct Program marketing campaign, oversee capacity building of participating lenders and ECs, and monitor the guaranteed loans and administer the loan guarantees including:

a) Establishing and operating the Project Monitoring Boards;
b) Administering payment of guarantee loss payment claims;
c) Exercising Guarantor rights pursuant to the loan guarantee agreements and mortgage sharing indentures;
d) Responding to default events; and
e) Managing workout and recovery processes together with the lenders, as required, including structuring and negotiating successful loan workout and rescheduling.

Cash Flows from Guarantee Revenues. LGUGC will manage the EC Partial Credit Guarantee Program clearly separated from its ongoing LGU guarantee program. Performance-based compensation for LGUGC will be through its retention of the front-end processing fees charged for the loan guarantee transactions under the Project. The balance of the revenues generated from the guarantee program, including guarantee fees, will be accrued to a Guarantee Revenue Account, in the name of the DOE, and the funds from this account will be used to cover operating costs of the guarantee program under the Project. LGUGC will be accountable to DOE and WB for use of all funds in the Guarantee Revenue Account. EC guarantee revenues will be used for, in order: (1) cash operating costs directly related to the EC guarantee program (excluding GEF-financed technical assistance and training); and counterpart funding for the GEF-financed capacity building and project implementation support activities; (2) budgeted corporate management overhead costs related to the management of the EC guarantee program; and (3) the balance, would be secondary reserve available for use for contingency funding, including recovery costs, and for guarantee liabilities in excess of funds available in the Reserve Account. These revenues and expenses will be in peso and interest income (also in peso) would accrue into the Guarantee Revenue Account. Separately, interest earnings in US dollars accrued to GEF funds disbursed in the Reserve Account will be kept in Interest Income Account of DOE.

Operating and TA Cost-sharing with GEF funds. Based on the latest financial projection of LGUGC, within a range of plausible assumptions, revenues from the EC guarantee program (notably guarantee fees) are expected to be able to cover fully (a) the program's direct operating costs and budgeted corporate overhead; and (b) counterpart funding for the GEF-financed capacity building activities starting from around the second or third year of its operation. Thus, it is proposed that GEF grant for capacity building component be allocated to cover up to 80% of the incremental operating costs for the management of the guarantee program budgeted by LGUGC for its initial year of start-up operation. In the unlikely event that the Guarantee Revenue Account does not have sufficient funds to cover the above two cost items in subsequent years, DOE may consider drawing on its Interest Income Account to help finance the deficits, if justified.

Cash Waterfall and Order of Priority for Covering Loan Losses

At the sub-project level, the borrower is required to fund debt service reserve and other escrow accounts, for the benefit of the lenders, from defined EC revenue sources as part of loan security package. Debt

service payments would be drawn from the debt service accounts, and if inadequate, the borrower would pay debt services from other sources. In event of debt service default, guarantees would be called and the Guarantee Program Manager would pay loan debt service payments due to the lender under the guarantee, from Guarantee Reserve Account, Interest Income Account or Guarantee Revenue Account, and institute remedies.

Disposition of Recovered Monies. All recovered monies recovered by Guarantor in the process of exercising recovery and legal actions in events of borrower default and guarantee pay-out, net of recovery costs incurred by the Guarantee Program Manager shall be converted into US dollar and deposited back into the Guarantee Reserve Account. Escrow Agreement will include definition of eligible recovery costs; DOE-PMO will be responsible for overseeing and enforcing Guarantee Program Manager compliance with these definitions.

Illustrative financial scenarios for the Partial Credit Guarantee Program

The Partial Credit Guarantee Program will be funded with GEF grant funds of $10 million disbursed in two tranches. A financial model for the program is being prepared by LGUGC as the Guarantee Program Manager to provide financial projection and pro forma financial statements for the operation of the program for the project implementation period during which guarantees would be available backed by the GEF-funded reserves. Based on numerous assumption as described below in the illustrative case, it is expected that the Partial Credit Guarantee program could support some 30 EC subproject investments, both by Non-EC entities including the pilot IMCs and by qualified ECs, with combined investment amounts in excess of $50 million over the project implementation period. This is based on the assumption that the Guarantee Program Leverage Ratio, calculated as the total outstanding guarantee amount against the amount of reserves, could go beyond 1.0 and reach around 1 as the GEF-backed Guarantee Program establishes its credit and operational record in the market over the program life. Given that (i) investments are financed through debt and equity; (ii) guarantees are partial, covering part of debt service payments; and (iii) committed guarantee amount for a given transaction would decrease with loan principal amortization, it is estimated that the Program would allow the commitment of some $27 million partial credit guarantees to mobilize commercial loans for such investments of some $42 million, and thereby support project investments of some $50 million.

It is expected that lenders would require the borrower to establish debt service reserve funds and other escrow accounts for the benefit of the lenders/guarantor to provide a debt service cushion and a cure period as part of loan security package, in addition to typical loan security package, including revenue pledge, mortgage on distribution system assets and other encumbered assets and full faith and obligations of the borrower. LGUGC is expected to take a pro-active role, in coordination with lenders , to monitor borrower finances and loan performance; and manage workout and recovery processes as required to correct any default situation.

With the presence of such safeguard measures in loan condition requirements and monitoring, LGUGC in its base case scenario assumes a guarantee loss claim ratio of 2% against the outstanding guarantee liabilities. Assuming a recovery ratio of 40% and recovery costs being 15% of the amount of loss claim payments, this is in turn translated into ~~net~~ cumulative guarantee claim payments of $1.8 million by the end of the project implementation period; or cumulaive guarantee loss of $1.5 million net of recoveries, which would represent a 6% net guarantee loss for the cumulative guarantees committed over the program period. Under such scenario, the outstanding balances of the Guarantee Reserve Account and the Interest Income Account would be projected to be $9.3 million at the end of the project implementation period. Combined with the balance in the Guarantee Revenue Account as secondary reserve, total reserves for the program

are expected to be maintained in excess of $10 million. However, it is possible that the program will lose significant amount of reserves if the assumptions used in the projection, including the foreign exchange rate, will not hold.

In order to preserve the GEF funds, it has been agreed that: (i) in the event the cumulative amount of guarantee payments reaches $1.5 million, LGUGC will have to develop and implement a remedial action plan satisfactory to the DOE and the Bank with the aim to reduce the guarantee claims in the future; and (ii) in the event the cumulative amount of guarantee payments reaches $3 million, this will trigger suspension of new loan guarantee issuance by LGUGC and DOE will develop and implement a remedial action plan satisfactory to the Bank as a pre-condition for the resumption of new guarantee commitment.

Based on the LGUGC financial projection, revenues from the guarantee program (periodic guarantee fees and front-end fees), together with initial GEF-grant support for start-up costs and incremental operating costs, are expected to cover the program's operating costs and budgeted corporate overhead as well as counterpart funding for the GEF-financed capacity building activities.

Assumption for Typical Projects:

Project Finance and Guarantee Terms	**Type C**	**Non-EC/IMC**
EC Project Investment, average	$1,350,000	$2,500,000
Debt percentage in sources of funds	80.00%	80.00%
Debt amount, dollars	$1,080,000	$2,000,000
Debt amount, pesos	Php60,588,000	Php112,200,000
Loan Term, average, years	7.00	7.00
Grace Period, years	1.5	1.5
Estimated debt interest rate, in pesos, variable rate	13.00%	13.00%
Loan Repayment: equal semi-annual amortizations	12 installments	12 installments
Guarantee percentage, average	80.00%	50.00%
Guarantee liability, beginning principal	Php48,470,400	Php56,100,000
Guarantee Fee average, % per annum of guarantee liability	1.50%	1.50%
Guarantee Front-end Fee, %	1.00%	1.00%

Illustrative Financial Projections of the Partial Credit Guarantee Program

($000)

Year		2004	2005	2006	2007	2008	2009	2010	2011
Foreign Exchange Rate Assumption		*56.10*	*58.36*	*60.70*	*63.13*	*65.65*	*68.28*	*71.01*	*73.85*
No. of Projects:	*Total*								
Non-EC/IMC	10	0	1	2	2	2	2	1	0
Type C EC	20	2	3	3	3	3	3	3	0
Total	30	2	4	5	5	5	5	4	0
Cumulative Total		*2*	*6*	*11*	*16*	*21*	*26*	*30*	*30*
Project Investment Amount:	*Total*								
Non-EC/IMC	*25,000*		2,500	5,000	5,000	5,000	5,000	2,500	0
Type C EC	*27,000*	2,700	4,050	4,050	4,050	4,050	4,050	4,050	0
Total	*52,000*	2,700	6,550	9,050	9,050	9,050	9,050	6,550	0
Cumulative Total		*2,700*	*9,250*	*18,300*	*27,350*	*36,400*	*45,450*	*52,000*	*52,000*

Debt Amount of Investment:	*Total*								
Non-EC/IMC	*20,000*	0	2,000	4,000	4,000	4,000	4,000	2,000	0
Type C EC	*21,600*	2,160	3,240	3,240	3,240	3,240	3,240	3,240	0
Total Origination	*41,600*	2,160	5,240	7,240	7,240	7,240	7,240	5,240	0
Cumulative Total Debt		*2,160*	*7,400*	*14,640*	*21,880*	*29,120*	*36,360*	*41,600*	*41,600*
Guarantees Committed (Loan Prinicpal):	*Total*								
Non-EC/IMC	*10,000*	0	1,000	2,000	2,000	2,000	2,000	1,000	0
Type C EC	*17,280*	1,728	2,592	2,592	2,592	2,592	2,592	2,592	0
Total New Guarantees	*27,280*	1,728	3,592	4,592	4,592	4,592	4,592	3,592	0
Cumulative Guarantees Committed (A)		*1,728*	*5,320*	*9,912*	*14,504*	*19,096*	*23,688*	*27,280*	*27,280*
Guarantees Outstanding *(End Balance)*:		*1,840*	*5,512*	*9,777*	*13,316*	*16,040*	*17,948*	*17,976*	*13,606*
Guarantee Claim Payments		0	110	196	266	321	359	360	272
Cumulative Guarantee Claim Payments		*0*	*110*	*306*	*572*	*893*	*1,252*	*1,611*	*1,884*
% of Cumulative Guaranees Committed		*0.0%*	*2.1%*	*3.1%*	*3.9%*	*4.7%*	*5.3%*	*5.9%*	*6.9%*
less Recoveries		0	0	(27)	(47)	(64)	(77)	(86)	(86)
Net Guarantee Claim Payments		0	110	169	219	257	282	273	186
Cumulative Net Guarantee Claim Payments		*0*	*110*	*279*	*499*	*755*	*1,037*	*1,311*	*1,496*
% of Cumulative Guaranees Committed		*0.0%*	*2.1%*	*2.8%*	*3.4%*	*4.0%*	*4.4%*	*4.8%*	*5.5%*
Guarantee Reserve Account:									
GEF Fund Disbursement		5,000		5,000					
Guarantee Claim Payments less Recoveries		0	(110)	(169)	(219)	(257)	(282)	(273)	(186)
Escrow Agent Fee		(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)
End Balance (B)		4,988	4,865	9,683	9,451	9,182	8,888	8,602	8,404
Interest Earnings Account:									
Interest Earnings		38	75	75	148	147	145	143	141
End Balance (C)		38	113	188	336	482	627	770	911
Total Reserves (B+C)		5,025	4,978	9,871	9,787	9,664	9,515	9,372	9,314
Leverage (A/(B+C))		*0.37*	*1.11*	*0.99*	*1.36*	*1.66*	*1.89*	*1.92*	*1.46*
Guarantee Revenue Account *(Peso 000)*:									
Net Addition/Subtraction		387	1,414	3,674	6,508	7,348	10,240	12,144	10,993
Interest Earnings		0	23	109	337	747	1,233	1,921	2,765
End Balance		387	1,825	5,608	12,453	20,548	32,021	46,086	59,844
End Balance ($000 equiv.) (C)		7	31	92	197	313	469	649	810
Total Reserves (B+C+D)		5,032	5,009	9,963	9,984	9,977	9,984	10,021	10,125
Leverage (A/(B+C+D))		*0.37*	*1.10*	*0.98*	*1.33*	*1.61*	*1.80*	*1.79*	*1.34*
Gurantee Revenue Account *(Peso 000)*									
Guarantee Fee Income		387	3,269	7,173	11,327	15,065	18,247	20,225	18,576
Program Operating Expenditure		(4,925)	(5,858)	(6,339)	(6,697)	(7,080)	(7,490)	(7,928)	(8,398)
Operating Income (Loss)		(4,538)	(2,590)	833	4,629	7,985	10,757	12,297	10,178
Guarantee Revenue Account Cash Flow *(Peso 000)*:									
Operating Income (Loss)		(4,538)	(2,590)	833	4,629	7,985	10,757	12,297	10,178
GEF Grant for Program Operation, etc.		4,211	4,043	2,998	2,148	0	0	0	0

GEF Grant for TA	3,902	8,426	9,952	8,265	5,323	1,845	1,853	0
LGUGC Counterpart Fund for Program Operation, etc.	714	926	658	472	0	0	0	0
LGUGC Counterpart Fund for TA	586	1,350	1,581	1,362	1,078	374	277	0
Reimbursement of Recovery Costs	0	0	965	1,780	2,522	3,159	3,676	3,830
Total Cash Inflow	*4,875*	*12,155*	*16,988*	*18,657*	*16,908*	*16,136*	*18,104*	*14,007*
TA Expenditure	(4,488)	(9,776)	(11,533)	(9,627)	(6,401)	(2,219)	(2,130)	0
Recovery Costs	0	(965)	(1,780)	(2,522)	(3,159)	(3,676)	(3,830)	(3,015)
Total Cash Outflow	*(4,488)*	*(10,741)*	*(13,313)*	*(12,149)*	*(9,561)*	*(5,896)*	*(5,960)*	*(3,015)*
Net Cash Flow from Revenue Account	*387*	*1,414*	*3,674*	*6,508*	*7,348*	*10,240*	*12,144*	*10,993*

Annex 6(A): Procurement Arrangements

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Procurement

Guidelines. Procurement of goods and consultant services funded wholly or partially by the GEF Grant will be carried out in accordance with the Bank's procurement guidelines ("Guidelines - Procurement under IBRD Loans and IDA Credits" of January 1995, revised January and August 1996, September 1997, and January 1999; and the "Guidelines - Selection and Employment of Consultants by World Bank Borrowers" of January 1997, revised September 1997, January 1999 and May 2002).

The project has limited procurement under GEF-financed funds, since the bulk of the GEF funds will be disbursed into a guarantee reserve account, for which there will be no procurement activities. Funds from the reserve account would be used to provide partial credit guarantees to commercial banks lending to qualified Electric Cooperatives (ECs) and non-EC investors. Procurement under investment subprojects will be using non-GEF funds and, therefore, it is not subject to Bank procurement procedures but such practices will be required to be based on economy and efficiency principles, and should be in accordance with procedures which meet the requirements of paragraph 1.5 of the Bank's Procurement Guidelines. Procurement for GEF-financed activities will involve about US$2 million over seven years. Specific procurement arrangements are summarized in Tables A and A1. Table B provides the thresholds for procurement methods and prior review, and Table C (Annex 6B) provides the allocation of Grant proceeds.

Summary of the Procurement Capacity Assessment of the Implementing Agencies. World Bank staff undertook the assessment of the project's executing agency, DOE, during the appraisal stage of the associated Rural Power Project. The procurement assessment (in project files) was fully discussed and agreed with DOE in February 2003, and the general findings conform to those of the Country Procurement Assessment Report (CPAR). However, since it is expected that the entity will not have significant familiarity with Bank procurement guidelines, provisions for Bank procurement training have been made in the project budget to improve their capacity to implement the project. Overall risk assessment for the project: average risk category.

Department of Energy (DOE). Since the PMO of DOE will be the same as with the Rural Power Project, the previous procurement assessment conducted earlier this year will be applicable for this project. Nevertheless, a supplemental assessment was carried out for this project. The assessment found that, since the PMO was only formed for the Rural Power and System Loss Projects, their staff have limited experience in procurement on Bank-funded projects. It was noted that this PMO will include staff that are currently involved in the implementation of the ongoing PHRD and GEF (PDF B) grants, and were also involved in the selection of the consultants for these grants. The assessment, however, concluded that DOE will still require the expertise of a Procurement Specialist who is very experienced on Bank procurement, to help them facilitate all the required procurement on the project. DOE has indicated its intention to hire the UNDP-Development Support Service Center (DSSC) as its administrative agent, to assist the DOE-PMO in project management and procurement for the GEF grant under the project. The assessment of UNDP-DSSC showed that they are capable in undertaking the required procurement and provide the necessary support to DOE in this aspect. Thus, the risk assessment of DOE is considered to be average.

Selected Guarantee Program Manager. A procurement assessment of the LGU Guarantee Corporation (LGUGC), the selected Guarantee Program Manager, has been conducted during project appraisal; and the assessment showed that their current practice in procuring goods and in selection of consultants is comparable to that of the Bank's procedures. They will not find it difficult to adhere to the Bank's procurement and consultant guidelines. Thus, the risk assessment of LGUGC is considered to be average. Most of the funds for this component will be deposited into the guarantee reserve account for which there

will be no procurement activities. In addition, a portion of the grant funds will be allocated to the selected Guarantee Program Manager to help defray start-up incremental and operating costs. The selected Guarantee Program Manager will also receive a small budget to help improve their abilities to implement the project for which some procurement will be required. A budget for training has also been allocated to the Guarantee Program Manager to assist appropriate staff to take the necessary procurement training offered by the Bank.

Conflicts Between GOP Procurement Procedures and Those Acceptable to the World Bank. The Country Procurement Assessment Report (CPAR) for the Philippines was completed in June 2002, and it assessed the procurement risk as average. The Philippines' Public Procurement System, through its various laws, rules and regulations, adhere to the principle of competition and are intended to promote fairness, economy, efficiency and transparency. However, there are certain rules and regulations, and procedures, which may not fully support these principles in procurement transactions. Also, there are serious weaknesses in the implementation of the system which led to: (a) cumbersome procurement processes and unnecessary delays; (b) inadequate capacity of implementing agencies; (c) ineffective oversight; (d) high incidence of rebidding; and (e) lack of accountability.

In recent years, the conflicts with the Bank's Procurement Guidelines for works and goods and the Consultants' Guidelines have been eliminated through the amendments made to national bidding laws, rules and regulations. The amendments invariably mandate that "for contracts financed partly or wholly with funds from international financing institutions, the corresponding loan/grant/credit agreement between the government and the concerned IFI shall prevail." Most recently, an "Act Providing for the Modernization, Standardization and Regulation of the Procurement Activities of the Government and for Other Purposes", otherwise known as Republic Act No. 9184, was approved into law by the President of the Republic of the Philippines. The waiver provisions mentioned above are found in this R.A. No. 9184.

Procurement Methods.

a. Goods: As summarized in Table A, the total cost of goods is estimated at US$90,000, all of which would be financed under the GEF grant. This includes procurement of office equipment (computers, software, manuals, etc.) to support the implementing agencies (DOE and the selected Guarantee Program Manager) to adequately supervise the project. Each agency would procure about $45,000 worth of equipment in 1-2 lots (all contracts would be under $50,000 each) using national shopping procedures.

b. Subprojects: As noted in the project summary, the partial loan guarantee program would facilitate loans to ECs and EC investors to upgrade their networks. An estimated US$50 million in loans are expected to be supported under the program and none of this would be directly financed by the GEF grant. As such, all procurement would follow established private sector commercial practices.

c. Services: The aggregate amount of consulting services is estimated at US$1.65 million over 7 years, of which US$1.40 million would be financed by the GEF grant. For Subcomponent 1 under LGUGC, assignments would include program marketing and outreach, program monitoring and evaluation services, technical appraisals, technical assistance to ECs for pipeline development and audit services (estimated to cost the equivalent of $830,000 in aggregate). No contracts are over $200,000, so no QCBS would be used for this component. The program marketing and outreach assignment would be procured using selection under a fixed-budget (SFB); the other contracts (all under $100,000) would follow selection based on consultant's qualifications (CQ), individual selection or sole source selection. Sole source would be justified for the small contract (estimated at about $2,500 per year) for audit services for this Project to be rendered by the same external auditor for LGUGC's existing operations. Subcomponent 2 under DOE would involve assignments including customized TA to Type C ECs, program monitoring and evaluation services, program marketing, EC regulation, IMC regulation, project management and technical advisors (estimated to cost the equivalent of $0.85 million in aggregate). QCBS would be used for all contracts over

$200,000, such as the general technical assistance to ECs; SFB would be used for EC regulation; the balance of the contracts (under $100,00 each) would follow CQ, individual selection or sole source selection. Sole source would be justified for UNDP-DSSC to assist the DOE-PMO in project management, procurement, financial management and disbursement based on the following: (a) the arrangement will facilitate streamlining of procedures at DOE and allow for efficient project implementation; (b) the assignment is small in terms of contract value which is estimated to be less than $50,000 and this is considered economical in relation to the work program; and (c) DSSC has a track record with DOE -- it has been playing the similar role in the implementation of two on-going GEF projects and DOE is satisfied with DSSC's performance. The Guarantee Program Manager's Operations Manual and DOE's PIP will include a detailed procurement plan and procedures for this project. A summary of procurement methods and prior review thresholds can be found in Tables A1 and B.

d. Training: The project budget also includes US$400,000 to support training activities of the Guarantee Program Manager, potential EC lenders and DOE's PMU staff. Each agency will be required to prepare an overall training plan (for the full project period) during the first year of the project for Bank review and approval by December 31, 2004 and updated annually thereafter.

e. Incremental Operating Costs: About US$150,000, including contingencies, will be allocated to the selected Guarantee Program Manager to help defray upfront start-up costs of creating the guarantee program, preparing operating guidelines and applications, developing standard EC credit appraisal methods, etc. This would includes expenditures for office supplies, equipment maintenance, facility rentals, and project staff travel, but not project staff salaries.

f. Guarantee Reserve: About US$10.0 million, including contingencies, would be needed to capitalize the guarantee reserve fund. Unlike typical Bank projects, which disburse funds for goods, works and services, this project would need to disburse the $10 million reserve funds upfront (proposed to be in two tranches) to establish the guarantee reserve account. This would then allow the selected Guarantee Program Manager to underwrite loans to ECs and disburse funds from the reserve account for agreed default events.

Procurement methods (Table A)

Table A. Project Costs by Procurement Arrangements

(US$ million equivalent)

	Procurement Method[1]				
Expenditure Category	**ICB**	**NCB**	**Other**[2]	**N.B.F.**	**Total Cost**
1. Goods	0.00	0.00	0.09	0.00	0.09
(GEF-financed)	(0.00)	(0.00)	(0.08)	(0.00)	(0.08)
2. Subprojects	0.00	0.00	0.00	50.00	50.00
(GEF-financed)	(0.00)	(0.00)	(0.00)	(0.00)	(0.00)
3. Services	0.00	0.00	1.65	0.00	1.65
(GEF-financed)	(0.00)	(0.00)	(1.40)	(0.00)	(1.40)
4. Training	0.00	0.00	0.40	0.00	0.40
(GEF-financed)	(0.00)	(0.00)	(0.40)	(0.00)	(0.40)
5. Incremental Operating Costs	0.00	0.00	0.15	0.00	0.15
(GEF-financed)	(0.00)	(0.00)	(0.12)	0.00	(0.12)
6. Guarantee Reserve	0.00	0.00	10.00	0.00	10.00
(GEF-financed)	(0.00)	(0.00)	(10.00)	(0.00)	(10.00)
Total	0.00	0.00	12.32	50.00	62.32
(GEF-financed)	(0.00)	(0.00)	(12.00)	(0.00)	(12.00)

Notes:

1. All costs include contingencies. Figures in parenthesis are the amounts to be financed by the GEF grant.
2. Other procurement methods include national shopping (for goods), selection of consultants (see Table A1) and training.
3. Total project costs do not include $250,000 of in-kind support from DOE.
4. No procurement is associated with the incremental costs or guarantee reserve components.

Table A1. Consulting Selection Arrangements

Consultant Services Expenditure Category	**Selection Method**					**Total**
	QCBS	**SFB**	**CQ**	**Other**	**NBF**	
A. Firms	0.32	0.20	0.30	0.03	0.00	0.85
	(0.28)	(0.17)	(0.26)	(0.03)	(0.00)	(0.74)
B. Individuals	0.00	0.00	0.00	0.80	0.00	0.80
	(0.00)	(0.00)	(0.00)	(0.66)	(0.00)	(0.66)
Total	0.43	0.20	0.30	0.70	0.00	1.65
	(0.38)	(0.17)	(0.26)	(0.54)	(0.00)	(1.40)

Notes:

1. All figures include contingencies.
2. Figures in parenthesis are the amounts to be financed by the GEF grant.
   QCBS = Quality- and Cost-Based Selection
   SFB = Selection under a Fixed Budget
   CQ = Consultant Qualifications
   Other = Selection of individual consultants and selection through sole source
   NBF = Not Bank Financed

Prior Review. The procedures set forth in paragraph 2 of Appendix 1 to the Procurement Guidelines shall apply to the first contract for goods from each implementing agency (LGUGC and DOE), regardless of cost, and all contracts for goods estimated to cost the equivalent of US$50,000 or more, while the procedures set forth in paragraph 2 of Appendix 1 to the Consultant Guidelines shall apply to all consulting services' Terms of Reference. Prior review for consulting services is required for contracts with firms

estimated to cost the equivalent of US$100,000 or more, and for contracts with individuals estimated to cost the equivalent of US$50,000 or more. For contracts with firms less than the equivalent of US$100,000, the first contract from each implementing agency (LGUGC and DOE) will be subject to prior Bank review and approval; for contracts with individuals less than the equivalent of US$50,000, the first contract for each agency will be subject to prior Bank review and approval. (See Table B.)

Post Review. With respect to each contract not subject to prior review, the procedures set forth in paragraph 4 of Appendix 1 to the Procurement and Consultant Guidelines will apply. The ratio shall be 1:5.

Table B. Thresholds for Procurement Methods and Prior Review

Expenditure Category	Contract Threshold (USD '000)	Procurement Method	Contracts Subject to Prior Review (USD million)
Goods	<=50	NS	First contracts from each IA ($0.09)
Services	>=100 (firms)	QCBS, SFB	All ($0.52)
	<100 (firms)	CQ	First contract from each IA ($0.20)
		SSS	All ($0.03)
	<50 (individuals)	IC	First contract from each IA ($0.01)
	TORs (regardless of cost)		
Total Value of Contracts Subject to Prior Review			$0.85 (6% or $0.74 of the GEF grant)

Overall Procurement Risk Assessment: Average

Frequency of procurement supervision missions proposed: Supervision missions will be conducted once every six months for the entire project period.

Annex 6(B): Financial Management and Disbursement Arrangements
PHILIPPINES: Electric Cooperative System Loss Reduction Project

Financial Management

1. Summary of the Financial Management Assessment

Country. There are no items in the action plan of the 2002 Country Financial Accountability Assessment (CFAA) that could significantly have impact on the project. The following is one current issue that is relevant to the Project:

Project Accounting – A new government accounting system (NGAS) is currently still in its initial stage of adoption. The NGAS aims to i) simplify government accounting; ii)conform to international accounting standards; and iii) generate periodic and relevant financial statements for better monitoring. COA has also developed a computerized NGAS. This accounting software, however, needs further customization to suit the particular needs of each user agency. The implementation of the manual version has already been implemented. However, some implementation problems are cropping up and COA are addressing these problems through additional training and on the job guidance by agency auditors. The computerized version of NGAS is being piloted in some agencies but not yet for foreign-assisted projects.

Risk Analysis. An FM assessment of DOE was recently conducted in support of the associated Rural Power Project. In general, DOE was found to have adequate financial control systems in place for supervision of Component 2. The PMO for the Rural Power Project will be the same for this project and they will maintain separate books and prepare Financial Monitoring Reports. A full financial management assessment of LGUGC, the selected Guarantee Program Manager, has been conducted during Project Appraisal. In addition, a full financial management assessment of UNDP-DSSC will be conducted in the event that DOE will access the services of UNDP-DSSC for its financial management functions. The following supervision plan, already adopted for the Rural Power Project, is proposed to remedy any weaknesses within LUGGC and DOE.

Risks	Rating	Mitigating Measures/Comments
I. Inherent risk	N	LGUGC is a private owned company (51% owned by the Bankers Association of the Philippines (BAP) and 49% by the Development Bank of the Philippines (DBP), a government-owned financial institution.
II. Control risks		
a. Implementing entity	M	LGUGC has no experience implementing Bank-financed projects. However, it has been in operation as a guarantor corporation for over five years. Based on the last two years audited financial statements, it has posted a net income representing around 40% of its gross income. The set up of the project management office (PMO) for this project will follow the existing organization chart. LGUGC's organization structure is clearly defined and the FM organization in particular satisfies the Bank's minimum requirement. LGUGC's organization chart has provided hiring of additional staff for both accounting and treasury should the need arises. All account (sub-project) approvals are done by either the Board of Directors or the Executive Committee based on the recommendations by the credit committee.
b. Funds flow	M	The GEF funds for capacity building in LGUGC will flow directly to the project's special account of LGUGC. It was discussed and agreed with LGUGC that the EC guarantee program will be established as a profit center separated from its ongoing LGU guarantee program. As such, all the revenues generated by LGUGC from the EC guarantee program will be accrued to this profit center, and the internally generated cash will be used to cover (1) operating costs directly related to the EC guarantee program (excluding GEF-financed technical assistance and training); and (2) counterpart funding for the GEF-financed capacity building activities. Any surplus cash will first be deposited in an escrow account as secondary reserves to cover potential loss claims, and there will be no dividend payout until the secondary reserves reach a reasonable level of the EC loan guarantee committed by LGUGC. LGUGC has no prior experience in the management of disbursements from the Bank. A brief orientation on the Bank's policy on disbursements and procurement is suggested.

c. Staffing	M	LGUGC as a whole has a lean organization. FM group is composed of one staff each for accounting and treasury. Any weaknesses in control resulting from no complete segregation of incompatible functions is mitigated by the close supervision of the operations group head, who reviews and approves all transactions and financial reports prior to distribution. Further, the transactions are not complex, LGUGC's operation being a guarantor only compared to a lending operation, and they are few. Management recognizes the possibility that volume of business may increase and therefore has provided one additional staff each for accounting & treasury, who will be hired when the need arises. The present FM staff are all graduates of accountancy and have adequate work experience. The operations group head, with the rank of senior vice president, has great work experiences and high educational attainments.
d. Accounting policies and procedures	N	LGUGC has a manual that documents its accounting policies and procedures, which includes the duties and responsibilities of staff and officers in terms of the processing of transactions. Its books of accounts are maintained following accounting principles generally accepted (GAAP) in the Philippines. In addition to producing annual audited financial statements prepared in accordance with GAAP in the Philippines, it has also prepared and issued audited financial statements prepared in accordance with International Accounting Standards (IAS). The difference between the two statements is only in the accounting of pre-operating costs, which under Philippine GAAP can be amortized over its economic life. In 2003, this difference will no longer be applicable as the pre-operating costs were already fully amortized in 2002. The project will use the entity's accounting system. A separate profit center will be established for the electric cooperative guarantee operation with the TA component of the grant. The entity's accounting system allows the creation of a separate sub-code for the project and preparation of separate reports for the project.

e. Segregation of duties	M	See discussion under staffing. Procurement, which are mostly office supplies and equipment, is handled by the Human Resource and Administration Department, from ordering, receiving and safekeeping. Treasury and accounting departments are responsible for paying and recording. Bank reconciliation is handled by the accounting staff. Any weaknesses in the system is mitigated by the close supervision of the

		senior vice president of the operations group.
f. Budgeting system	N	All department are involved in the budget preparation. Variances of actual versus budget are discussed during the monthly operations committee meetings and reported to the Board of Directors. Approval by the president/CEO is required for any expenditures in excess of the budget.
g. Payments	N	There are only few types of expenditures and processing of payments are defined in the internal controls manual.
h. Cash on hand and in bank	N	There is no bank account opened yet for the EC project. Controls and procedures over cash are already in place for LGUGC's current operation.

i. Safeguard over assets	N	There is already an existing system of controls and procedures over safeguarding of assets.
j. Other implementing offices and entities	M	The other implementing agency for this EC project is DOE. An inter-agency project supervisory committee (PSC), with DOE as the chair, and LGUGC and the selected trustee for the escrow account as members, will be organized to provide overall policy direction, guidance and oversight supervision for the policy and institutional reforms supported under the program. At the implementation level, a Technical Working Group (TWG) will be organized to serve as a secretariat to the PSC and be responsible for the overall coordination and supervision of the implementation of the Project.
k. Internal audit	N	There is not internal audit unit. However, this is not a significant weakness because the transactions are not complex and the operation is still not high.
l. External audit	N	LGUGC's external auditor is a private accounting firm. For the years 1998 to 2002, Sycip, Gorres, & Velayo, previously the AA and currently the E&Y in the Philippines. For 2003, LGUGC changed it auditors to Guzman, Bocaling & Co., a local accounting firm not connected with any of the big five firms. Reason for change was both cost and service delivery per LGUGC. Since the entity and project transactions are not complex, no significant concern is involved with the 2003 auditors being engaged. There is a need though for the Bank to discuss with the auditors the Bank policy and the requirements. This is expected to be conducted upon the effectivity of the grant. No separate audit report is required for the EC project because it was agreed with LGUGC that sufficient EC project financial information will be disclosed in the entity's annual audited financial statements.
m. Reporting and monitoring	N	As discussed above, LGUGC issues annual audited financial statements prepared under GAAP in the Philippines and IAS. See discussion above on the frequency of preparation of other reports and the process of review. The existing chart of accounts is not prepared to report on the project components. However, this would not pose a significant problem because there are only a few components the EC project.
n. Information system	N	LGUGC uses the ACCPAC general ledger system

H – High S – Substantial M – Moderate N – Negligible or Low

Strengths and Weaknesses

Strengths

DOE has already experiences in implementing Bank financed projects and, therefore, familiar with Bank policies.

LGUGC has well documented operations and financial management policies and procedures of its existing operations, which could easily be adapted for the proposed project, and a well defined organization structure. Its president/CEO together with the senior vice presidents for operations group and portfolio management group are highly qualified, with high academic achievements and vast work experience. These three officers are greatly involved in the day to day operations of the company.

Weaknesses

LGUGC has no prior experience in implementing Bank financed projects. Nevertheless, this is mitigated by the existence of highly qualified officers and FM staff who are expected to immediately learn the Bank policies and procedures with regards to this proposed project after the Bank will conduct a short seminar on financial management, disbursements and procurement. For other information, please refer to the risk analysis.

Supervision Plan. The FM supervision of the project shall be undertaken periodically to ensure that the grant proceeds are used only for the purposes agreed, with due regard to economy, efficiency and the attainment of the project's objectives. This normally addresses the following:

a. The mitigation or compensating procedures that have been undertaken by the project on the risks and weaknesses identified during the assessment or in the previous supervision;
b. Ensuring that the FM system agreed is being maintained or further strengthened;
c. That the FMRs are being submitted on a timely basis and that the disbursements are on track; and
d. That there is adequate and timely budget appropriation and releases.

Coverage – The scope of the supervision should cover the entire project FM arrangements. The magnitude and level of detail of the review of the components, implementing agencies involved and geographic areas is left to the professional judgment of the FM Specialist. The following aspects of FM would be covered in the supervision:

1. Maintenance of an adequate FM System, including the implementation of the NGAS, in the Implementing Agencies;
2. Review of SOEs on a sampling basis;
3. Timeliness of FM reporting;
4. System of funds flow and cash planning;
5. Discussion with the external auditors of LGUGC and DOE on the progress of audit, significant findings and audit requirements of the Bank; and
6. Subproject visits and checking of financials as well as physical progress.

Frequency and duration – The project should be supervised periodically, at least every 6 months. Based on the nature of the work required under the Bank's policy and depending on the status of the project's FM and the action plans, the duration of the supervision may be from 1 to 3 weeks. Certain FM issues may be

addressed outside of the regular semi-annual supervision by conducting a 2 to 3-day visit.

Staffing – The supervision shall be conducted by an FMS. A review, by June 30, 2005, will be conducted to determine the adequacy of FM staffing to determine whether additional number of staff will be required.

Reporting - The following FMRs will be submitted to the Bank:

1. Financial Report (Statement of Sources and Uses of Funds) – Using the current format of the current Physical and Financial Status Report but should be in Financial terms which should at least include Current and Cumulative column. In addition, Receipts should be added before the use of funds and Fund balance should be added at the end. This should have a top sheet condensed report where everything is the same except that under the uses of funds the amounts shall just be by components. This will be submitted on a quarterly basis.
2. Physical Progress Report – Use the current report, Physical & Financial Status Report which has breakdown by component and subcomponent. The financial column must be linked to the Financial Reports in term of the figures reflected. This will be submitted on a quarterly basis.
3. Procurement Report – Current report on Annual Procurement Plan with addition of forecast and status in terms of stage and amount. This will be submitted on a semi annual basis.

2. Audit Arrangements

An external auditor, acceptable to the Bank, will be contracted by LGUGC, while COA will be the auditor for DOE. Throughout the implementation of this project, timely annual audit report, issued by an independent auditor, on LGUGC's financial statements , with adequate disclosure of the project accounts, together with the auditor's detailed comments on LGUGC's and the project's FM system (management letter) will be required to be submitted to the Bank not later than 6 months after the end of LGUGC's fiscal year. Similarly, DOE will send to the Bank, no later than 6 months after the end of DOE's fiscal year, audit report on the project financial statements for the GEF grant together with the auditor's management letter.

3. Disbursement Arrangements

The GEF grant would be disbursed against: (a) 100 percent of foreign expenditures or 100 percent of local expenditures (ex-factory cost) for goods; (b) 75 percent of local expenditures procured locally; (c) 87 percent of expenditures for consulting services for firms, 82 percent of expenditures for individuals and 100 percent of expenditures for tax exempt organizations; (d) 100 percent for training; (e) up to 80 percent for incremental operating costs; and (f) 100 percent of the amount deposited into the guarantee reserve fund account. These are summarized in Table C, below. The estimated annual disbursements for the project is shown in the Project Financing Data on page 1 and detailed in the DOE PIP (available in the Project files). Disbursements are expected to begin in 2004 and be completed in 2011.

As noted earlier, a waiver of the Bank's disbursement policies has been approved for this project. Up to 50 percent of the guarantee reserve amount (first tranche) will be disbursed upon grant effectivenes. Disbursement of the remaining 50 percent of the funds (second tranche) would be made upon the execution of loan guarantee agreements between the Guarantee Program Manager and lenders for eligible subprojects, totaling $4 million.

4. Conditions

Grant Effectiveness Conditions

Adoption by DOE and LGUGC the financial management system for the project, including a revised financial accounting manual with the chart of accounts, incorporating the project requirements and

procedures.

Allocation of grant proceeds (Table C)

Table C: Allocation of Grant Proceeds

I. LGUGC

Expenditure Category	Amount in US$million	Financing Percentage
Goods	0.045	100% of foreign expenditures 100% of local expenditures (ex-factory costs) 90% of local expenditures
Consultant Services (a) audit for FY04 and FY05 (b) other	0.693 0.005 0.688	87% of firms 82% of individuals 100% of tax exempt organizations
Training	0.100	100%
Incremental Operating Costs	0.039	80%
Total	0.877	

II. DOE

Expenditure Category	Amount in US$million	Financing Percentage
Goods	0.036	100% of foreign expenditures 100% of local expenditures (ex-factory costs) 90% of local expenditures
Consultant Services	0.707	87% of firms 82% of individuals 100% of tax exempt organizations
Training	0.300	100%
Incremental Operating Costs	0.080	80%
Guarantee Reserve		
(a) Loans to ECs	5.00	100% of the amount deposited into the Guarantee Reserve Escrow Account
(b) loans to non-ECs	5.00	100% of the amount deposited into the Guarantee Reserve Escrow Account
Total	11.123	

Use of statements of expenditures (SOEs):

For goods costing less than US$100,000 equivalent per contract; services provided by consulting firms costing less than US$100,000 equivalent per contract; services provided by individual consultants costing less than US$50,000 equivalent per contract; training activities costing less than US$50,000; withdrawals from the Grant would be made on the basis of statements of expenditures (SOEs).

Special account:

To facilitate disbursements under the Grant, one Special Account would be established for each of the implementing agencies with authorized allocations as follows: (i) US$50,000 to DOE; and (ii) US$40,000 for LGUGC. Replenishment applications should be submitted on a monthly basis or whenever the amounts withdrawn equal 20 percent of the initial deposit, whichever comes first.

Disbursements shall be based on the agreed eligibility/financing percentage in the Grant Agreement. Disbursements under the project shall comply with the World Bank's policies and procedures on disbursement and financial management as reflected in its Disbursement Handbook and Project Management Manual. No advances shall be allowed to be paid from the SA. Reimbursements from the SA shall be only for eligible and duly supported expenditures.

Annex 7: Project Processing Schedule

PHILIPPINES: Electric Cooperative System Loss Reduction Project

Project Schedule	Planned	Actual
Time taken to prepare the project (months)		30
First Bank mission (identification)		09/27/2001
Appraisal mission departure		09/22/2003
Negotiations		02/26/2004
Planned Date of Effectiveness		07/01/2004

Prepared by:
Philippine Department of Energy (DOE) and LGU Guarantee Corporation (LGUGC)

Preparation assistance:
Multi-disciplinary consultants funded by GEF project preparation grant

Bank staff who worked on the project included:

Name	Speciality
Selina Shum	Lead Financial Analyst, Task Team Leader
Jas Singh	Energy Efficiency Specialist (Consultant)
John MacLean	Project Finance/Credit Guarantee Specialist (Consultant)
Rene Manuel	Procurement Specialist
Preselyn Abella	Operations Officer: Financial Management
Maya Gabriela Villaluz	Operations Officer: Environment
Jose Tiburcio Nicolas	Operations Officer: Social Sector
Karin Nordlander	Lead Counsel
Hung Kim Phung	Senior Finance Officer
Charles Feinstein	Lead Energy Specialist, Peer Reviewer
Tomoko Matsukawa	Senior Financial Officer, Peer Reviewer

Annex 8: Documents in the Project File*

PHILIPPINES: Electric Cooperative System Loss Reduction Project

A. Project Implementation Plan

Project Implementation Plan of DOE

B. Bank Staff Assessments

1. Rural Power Sector Policy Note*
2. Rural Power Project Appraisal Document
3. GEF Project Brief*

C. Other

1. Summaries of consultations with civil society*
2. Proceedings of participatory project design planning workshop*
3. Summaries of donors consultation meetings*
4. Rural Power Sector Strategy Study*
5. Feasibility study for Investment Management Contract*
6. Preinvestment study for EC transformation*
7. Electric Power Industry Reform Act (EIRA); and Implementation Rules and Regulations of EIRA*(these and other sector information also avaible on DOE website (www.doe.gov.ph)
8. The Philippine Energy Plan (2004-2013)

*Including electronic files

Annex 9: Statement of Loans and Credits

PHILIPPINES: Electric Cooperative System Loss Reduction Project

16-Mar-2004

			Original Amount in US$ Millions						Difference between expected and actual disbursements[a]	
Project ID	FY	Purpose	IBRD	IDA	SF	GEF	Cancel.	Undisb.	Orig	Frm Rev'd
P066397	2004	PH-Rural Power Project	10.00	0.00	0.00	0.00	0.00	10.60	0.00	0.00
P066076	2004	JUDICIAL REFORM SUPPORT PROJECT	21.90	0.00	0.00	0.00	0.00	21.63	-0.27	0.00
P070899	2004	PH LAGUNA DE BAY ENVIRONMENT	5.00	0.00	0.00	0.00	0.00	5.00	0.00	0.00
P071007	2003	PH-Second Agrarian Reform CommunitiesDev	50.00	0.00	0.00	0.00	0.00	48.41	5.38	0.00
P073488	2003	PH - ARMM Social Fund	33.60	0.00	0.00	0.00	0.00	31.69	4.06	0.00
P077012	2003	PH KALAHI-CIDSS PROJECT	100.00	0.00	0.00	0.00	0.00	93.66	5.83	0.00
P069916	2002	PH-2nd Social Expenditure Management	100.00	0.00	0.00	0.00	0.00	68.48	-6.52	0.00
P069491	2002	PH-LGU URBAN WATER APL2	30.00	0.00	0.00	0.00	0.00	33.24	9.87	0.00
P057731	2001	PH-Metro Manila Urban Transport	60.00	0.00	0.00	0.00	0.00	53.60	20.60	0.00
P066509	2001	PH-MMURTRIP-Bicycle Nwk	0.00	0.00	0.00	1.30	0.00	1.31	0.51	0.00
P066069	2001	PH - LAND ADMIN & MANAGEMENT	4.79	0.00	0.00	0.00	0.00	1.98	1.99	0.00
P039019	2000	PH-First Nat'l Rds Improve.	150.00	0.00	0.00	0.00	0.00	81.26	78.15	0.00
P059933	2000	PH - COASTAL MARINE	0.00	0.00	0.00	1.25	0.00	0.97	1.60	0.38
P058842	2000	PH - MINDANAO RURAL DEV	27.50	0.00	0.00	0.00	5.50	6.08	11.58	3.56
P048588	1999	PH-LGU FINANCE & DEV.	100.00	0.00	0.00	0.00	40.00	49.19	54.59	6.56
P057598	1999	PH-RURAL FINANCE III	150.00	0.00	0.00	0.00	0.00	58.44	58.44	0.00
P004566	1998	PH-EARLY CHILD DEV.	19.00	0.00	0.00	0.00	0.00	4.99	4.99	0.00
P004576	1998	PH-WATER DISTRICTS DEV.	56.80	0.00	0.00	0.00	6.53	17.01	41.74	0.97
P004595	1998	PH - COMMUNITY BASED RESO	50.00	0.00	0.00	0.00	12.00	16.91	28.28	16.14
P004602	1997	PH-THIRD ELEMENTARY EDUCATION	113.40	0.00	0.00	0.00	20.10	37.12	57.22	30.26
P004613	1997	PH - WATER RESOURCES DEVE	58.00	0.00	0.00	0.00	16.27	6.19	22.46	5.23
P004611	1996	PH-MANILA SEWERAGE II	57.00	0.00	0.00	0.00	20.90	18.29	39.19	4.76
		Total:	1,196.99	0.00	0.00	2.55	121.30	666.05	439.69	67.86

PHILIPPINES
STATEMENT OF IFC's
Held and Disbursed Portfolio
Feb 29 - 2004
In Millions US Dollars

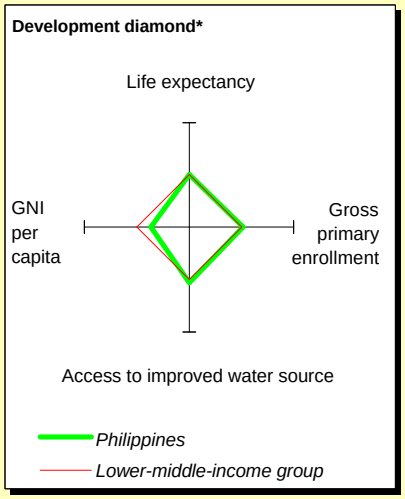
		Committed				Disbursed			
		IFC				IFC			
FY Approval	Company	Loan	Equity	Quasi	Partic	Loan	Equity	Quasi	Partic
2001	AEI	1.00	0.00	0.00	0.00	0.75	0.00	0.00	0.00
2001/02	APW Trade	0.00	0.00	0.69	0.00	0.00	0.00	0.69	0.00
2000	Alaska Milk	0.00	0.62	0.00	0.00	0.00	0.62	0.00	0.00
2002	Asian Hospital	7.00	0.00	0.00	0.00	5.00	0.00	0.00	0.00
1997	Banco de Oro	20.00	0.00	20.00	0.00	0.00	0.00	20.00	0.00
1998	Bataan P/E	26.28	0.00	8.36	102.83	26.28	0.00	8.36	102.83
2002	Drysdale Food	9.96	0.00	0.00	5.87	9.96	0.00	0.00	5.87
2001	Eastwood	20.00	0.00	0.00	0.00	20.00	0.00	0.00	0.00
1998	Filinvest	22.00	0.00	0.00	0.00	16.00	0.00	0.00	0.00
1989	H&Q PV III	0.00	5.76	0.00	0.00	0.00	5.76	0.00	0.00
1993	H&QPV-I	0.00	0.59	0.00	0.00	0.00	0.59	0.00	0.00
2000	H&QPV-II	0.00	1.11	0.00	0.00	0.00	1.11	0.00	0.00
2001	MFI MEP	0.00	0.12	0.00	0.00	0.00	0.12	0.00	0.00
2003	MNTC	46.00	0.00	0.00	0.00	28.60	0.00	0.00	0.00
2000	MWC	33.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1993	Mariwasa	11.58	0.00	3.12	0.00	11.58	0.00	3.12	0.00
1993	Mindanao Power	0.00	4.26	0.00	0.00	0.00	4.26	0.00	0.00
2001	Mirant Pagbilao	18.00	10.00	0.00	0.00	18.00	10.00	0.00	0.00
2002	PEDF	1.50	0.00	0.00	0.00	0.75	0.00	0.00	0.00
1992	PSMT Philippines	12.50	0.00	0.00	0.00	10.20	0.00	0.00	0.00
2000	Pilipinas Shell	0.00	1.56	0.00	0.00	0.00	1.56	0.00	0.00
1998	PlantersBank	0.00	0.00	8.71	0.00	0.00	0.00	8.71	0.00
2000	Pryce Gases	13.00	0.00	0.00	5.00	13.00	0.00	0.00	5.00
2000	SME.COM	0.00	0.08	0.00	0.00	0.00	0.00	0.00	0.00
2003	STRADCOM	11.99	0.00	8.00	0.00	9.59	0.00	8.00	0.00
1995	SVI	0.00	4.00	0.00	0.00	0.00	2.00	0.00	0.00
1992	Sual Power	23.73	17.50	0.00	83.27	23.73	17.50	0.00	83.27
1994	Union Cement	0.00	5.63	0.00	0.00	0.00	5.63	0.00	0.00
1994	Walden Mgmt	0.00	0.05	0.00	0.00	0.00	0.05	0.00	0.00
	Walden Ventures	0.00	0.83	0.00	0.00	0.00	0.83	0.00	0.00
	Total Portfolio:	277.60	52.11	48.88	196.97	193.44	50.03	48.88	196.97

		Approvals Pending Commitment			
FY Approval	Company	Loan	Equity	Quasi	Partic
2004	Coastal Road	0.02	0.02	0.00	0.04
2002	Eastwood	0.00	0.00	0.00	0.00
2004	Globe Telecom	0.02	0.00	0.00	0.00
2004	LARES	0.02	0.00	0.00	0.00
2000	LTO Project	0.00	0.00	0.00	0.02
2001	PEDF	0.00	0.00	0.00	0.00
2002	S&R Price	0.00	0.00	0.00	0.00
	Total Pending Commitment:	0.07	0.02	0.01	0.06

Annex 10: Country at a Glance

PHILIPPINES: Electric Cooperative System Loss Reduction Project

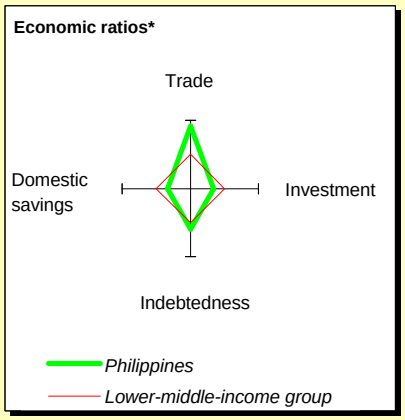
POVERTY and SOCIAL	Philippines	East Asia & Pacific	Lower-middle-income
2002			
Population, mid-year *(millions)*	79.9	1,838	2,411
GNI per capita *(Atlas method, US$)*	1,020	950	1,390
GNI *(Atlas method, US$ billions)*	81.5	1,740	3,352
Average annual growth, 1996-02			
Population *(%)*	2.2	1.0	1.0
Labor force *(%)*	2.3	1.2	1.2
Most recent estimate (latest year available, 1996-02)			
Poverty *(% of population below national poverty line) 1/*	28	..	..
Urban population *(% of total population)*	60	38	49
Life expectancy at birth *(years)*	70	69	69
Infant mortality *(per 1,000 live births)*	29	33	30
Child malnutrition *(% of children under 5)*	32	15	11
Access to an improved water source *(% of population)*	86	76	81
Illiteracy *(% of population age 15+)*	5	13	13
Gross primary enrollment *(% of school-age population)*	113	106	111
Male	114	105	111
Female	113	106	110



KEY ECONOMIC RATIOS and LONG-TERM TRENDS

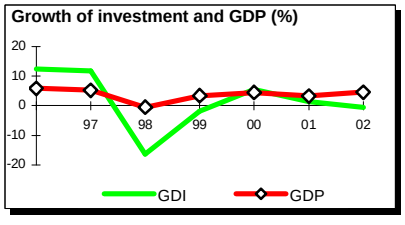
	1982	1992	2001	2002
GDP *(US$ billions)*	37.3	53.0	71.4	77.1
Gross domestic investment/GDP	27.9	21.3	17.6	16.6
Exports of goods and services/GDP	20.3	29.1	48.5	48.9
Gross domestic savings/GDP	22.1	16.4	19.0	17.7
Gross national savings/GDP	..	19.7	25.5	24.8
Current account balance/GDP	-8.6	-1.6	1.9	5.4
Interest payments/GDP	2.5	2.5	4.0	6.4
Total debt/GDP	65.4	62.3	80.9	77.7
Total debt service/exports	42.6	24.5	21.6	24.8
Present value of debt/GDP	..	..	77.4	..
Present value of debt/exports	..	..	132.7	..

	1982-92	1992-02	2001	2002	2002-06
(average annual growth)					
GDP	1.6	3.7	3.2	4.6	..
GDP per capita	-0.8	1.4	1.0	2.4	..

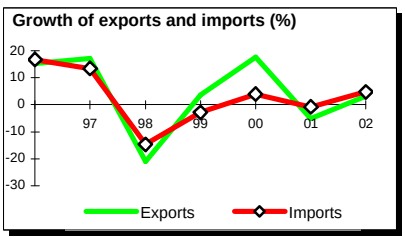


STRUCTURE of the ECONOMY

	1982	1992	2001	2002
(% of GDP)				
Agriculture	23.3	21.8	15.1	14.9
Industry	38.8	32.8	31.6	31.6
Manufacturing	25.1	24.2	22.8	22.9
Services	37.8	45.3	53.3	53.5
Private consumption	68.8	73.9	68.2	69.5
General government consumption	9.1	9.7	12.8	12.8
Imports of goods and services	26.1	34.0	47.0	47.8

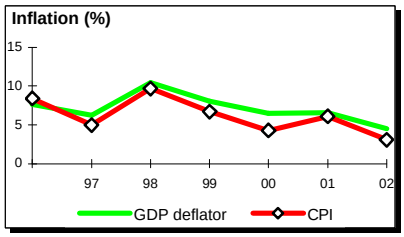


	1982-92	1992-02	2001	2002
(average annual growth)				
Agriculture	1.5	2.0	3.7	3.5
Industry	0.1	3.5	2.3	4.1
Manufacturing	1.3	3.5	2.9	3.3
Services	3.1	4.6	3.7	5.4
Private consumption 2/	2.8	3.9	1.9	7.1
General government consumption	1.9	3.9	0.3	1.8
Gross domestic investment	0.4	2.4	1.3	-0.6
Imports of goods and services	7.0	5.1	-0.8	4.9



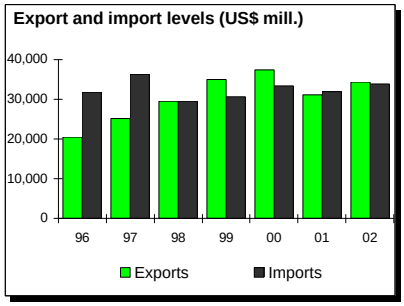
PRICES and GOVERNMENT FINANCE

	1982	1992	2001	2002
Domestic prices				
(% change)				
Consumer prices	..	8.9	6.1	3.1
Implicit GDP deflator	8.7	7.9	6.6	4.5
Government finance				
(% of GDP, includes current grants)				
Current revenue	..	18.0	15.5	14.3
Current budget balance	..	2.1	-2.3	-5.3
Overall surplus/deficit	..	-1.2	-4.0	-5.3



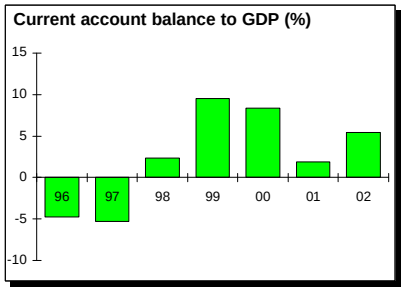
TRADE

	1982	1992	2001	2002
(US$ millions)				
Total exports (fob)	..	9,824	31,243	34,383
Electronics/Telecom	..	2,753	16,699	18,583
Garments	..	2,140	2,403	2,391
Manufactures	..	7,293	28,340	31,181
Total imports (cif)	..	14,519	31,986	33,975
Food	..	599	1,348	1,384
Fuel and energy	..	2,050	3,372	3,273
Capital goods	..	4,023	11,438	13,532
Export price index *(1995=100)*	..	..	..	..
Import price index *(1995=100)*	..	..	..	..
Terms of trade *(1995=100)*	..	..	..	..



BALANCE of PAYMENTS

	1982	1992	2001	2002
(US$ millions)				
Exports of goods and services	6,825	14,566	34,391	37,439
Imports of goods and services	9,467	16,834	37,184	38,295
Resource balance	-2,642	-2,268	-2,793	-856
Net income	-1,044	593	3,669	4,550
Net current transfers	486	817	447	503
Current account balance	-3,200	-858	1,323	4,197
Financing items (net)	2,471	2,350	-1,131	-4,857
Changes in net reserves	729	-1,492	-192	660
Memo:				
Reserves including gold *(US$ millions)*	..	4,338	15,658	16,180
Conversion rate *(DEC, local/US$)*	8.5	25.5	51.0	51.6



EXTERNAL DEBT and RESOURCE FLOWS

	1982	1992	2001	2002
(US$ millions)				
Total debt outstanding and disbursed	24,413	33,005	57,758	59,919
IBRD	1,519	4,179	3,250	3,324
IDA	49	166	204	208
Total debt service	3,513	4,302	9,004	11,271
IBRD	174	640	491	479
IDA	0	2	6	7
Composition of net resource flows				
Official grants	70	208	112	74
Official creditors	469	1,457	-258	-39
Private creditors	1,138	-1,330	2,883	1,057
Foreign direct investment	16	228	1,142	1,026
Portfolio equity	0	360	1,050	1,912
World Bank program				
Commitments	541	630	90	200
Disbursements	259	578	120	177
Principal repayments	61	325	312	327
Net flows	197	254	-192	-150
Interest payments	113	317	185	158
Net transfers	84	-63	-377	-308